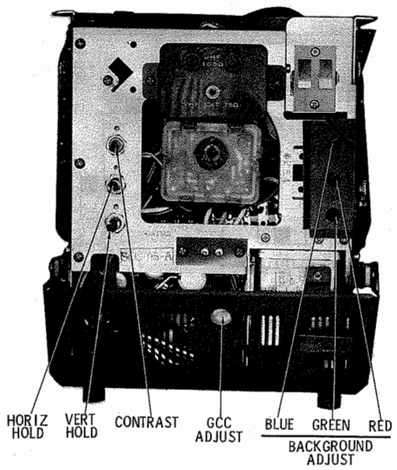
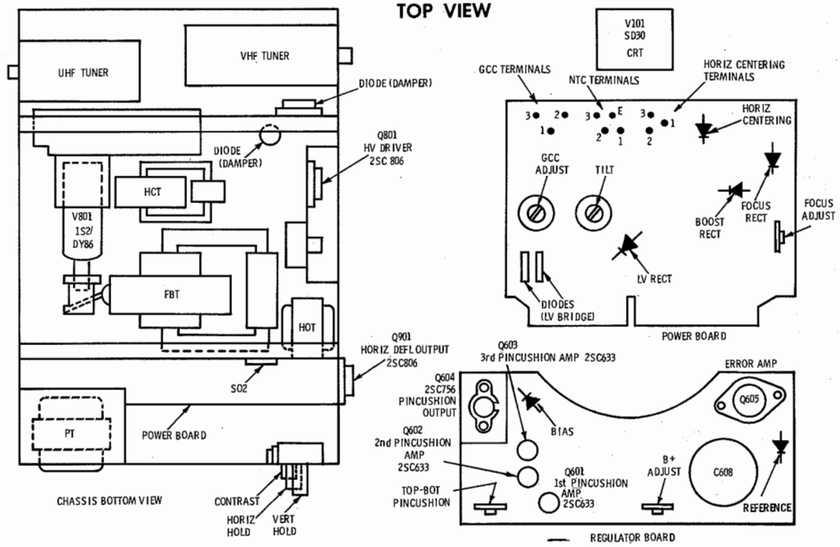
CABINET—REAR VIEW



TOP VIEW



DISASSEMBLY INSTRUCTIONS

CHASSIS AND PICTURE TUBE REMOVAL

1. Remove all control knobs from the set and remove four screws holding top cover of cabinet.

NOTE: Most components may be serviced without removing chassis.

2. Remove six screws holding bottom section of cover.
3. Remove two screws holding power supply printed circuit board. Unplug power supply connector from printed circuit board.
4. Remove four screws from video and sound printed circuit board and lower board down.
5. Remove three screws from chroma printed circuit board and lower board down.
6. Disconnect high-voltage anode lead and picture-tube socket.
7. Remove four screws holding power regulator and pincushion assembly and unplug connector to assembly.
8. Remove four screws holding safety-glass cover. Disconnect earphone jack and ground wire.
9. Remove two screws holding deflection-yoke bracket.
10. Remove six screws for removal of picture tube from chassis, 2 screws at the top rear of chassis and four screws holding picture-tube mounting brackets. Disconnect ground wire and degaussing coil wires.
11. Remove neck twist coil gun centering coil, deflection yoke, and remove picture tube from chassis.
12. Remove four screws holding control and speaker assembly.

For Supplier Address See PHOTOFACT Index

SAFETY PRECAUTIONS

Make sure line voltage does not exceed rating of set.

Check high-voltage regulation and adjust to correct value.

Be sure shields and rear cover are in place and secure.

Beware of shock from high voltage or AC line. Discharge high voltage to HV cage only.

Use extreme care when handling picture tube. Do not bump, scratch, or exert undue strain.

SERVICING IN THE FIELD

CRT IMPLOSION PROTECTION AND CLEANING

A separate safety glass is employed; remove six screws holding picture-tube safety glass protector on top and sides of the set.

AGC

The AGC may be varied by means of an RF AGC and AGC control. (See "Transistor Placement Chart" for location.)

VHF TUNER

The fine tuning mechanically engages oscillator slug for adjustment (one slug for each channel).

HORIZONTAL OSCILLATOR

Adjustment of the horizontal hold is accomplished by the proper setting of the horizontal hold control. (See photo "Cabinet - Rear View" for location.)

Coarse adjustment of the horizontal hold is accomplished by the proper setting of the horizontal frequency control. (See "Transistor Placement Chrat" for location.)

HORIZ. CENTERING

Three pins are provided, giving six possible combinations. Plug in Horiz. Centering pin for best results.

(It is necessary to remove cabinet top cover for Horiz. Centering Adjustments.)

WIDTH

No provision is made to vary the width on this receiver.

FOCUS

The focus may be varied by means of a focus control.

FUSE/FUSE DEVICE

A two-amp fuse, F902, is used for low-voltage power-supply protection. (See photo "Chassis - Front View" for location.)

A five-amp fuse, F901, is used for AC line protection. (See photo "Chassis-Front View" for location.)

REMEMBER TO ASK— "What else needs fixing?"

HOWARD W. SAMS & CO., INC. Indianapolis, Indiana 46206

The listing of any available replacement part herein does not constitute in any case a recommendation, warranty or guaranty by Howard W. Sams & Co., Inc., as to the quality and suitability of such replacement part. The numbers of these parts have been compiled from information furnished to Howard W. Sams & Co., Inc., by the manufacturers of the particular type of replacement part listed.

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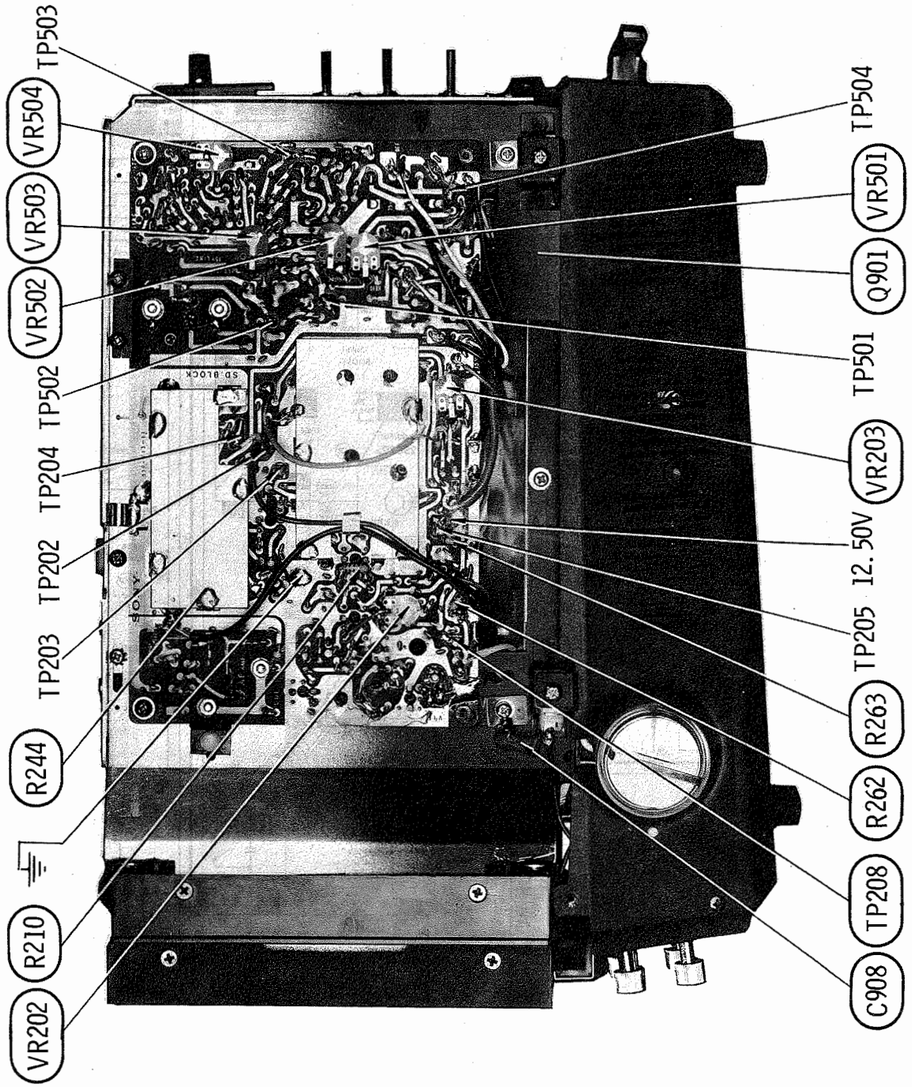
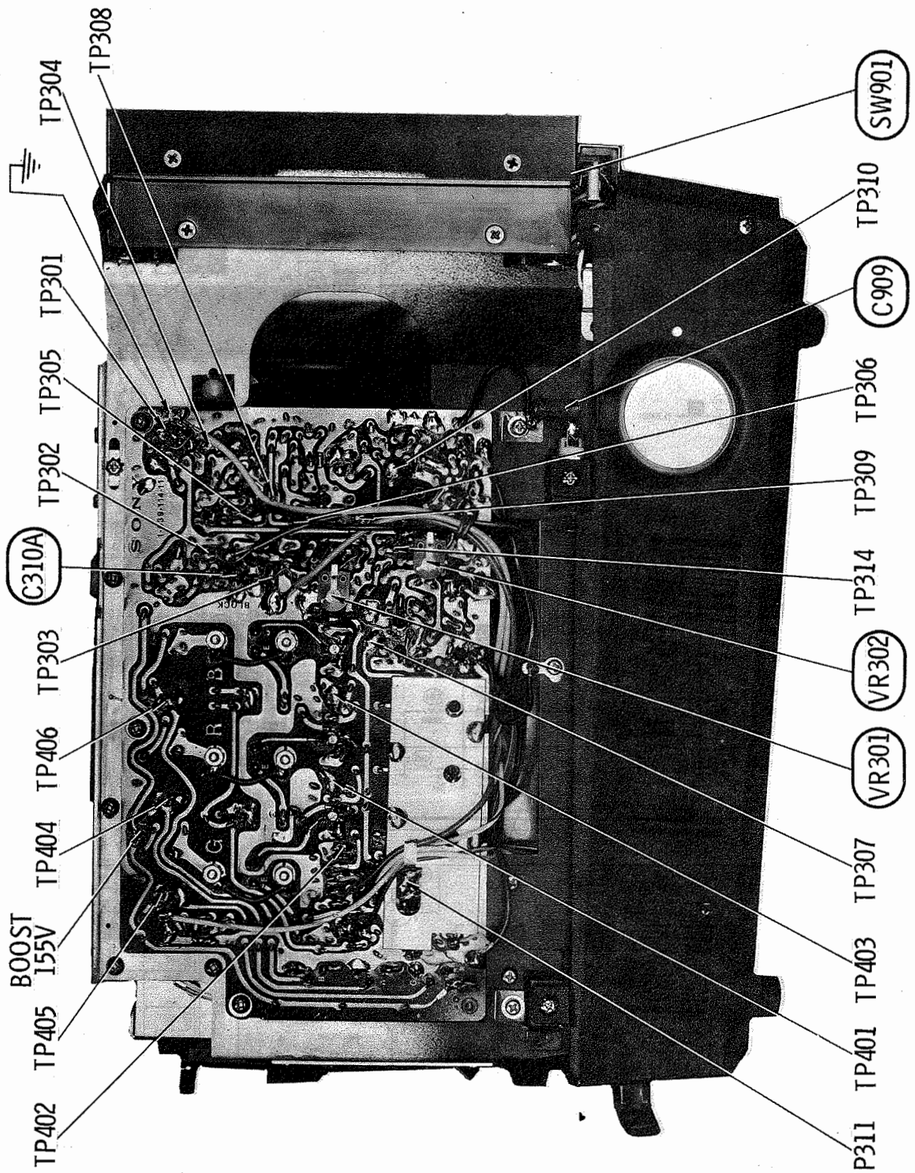
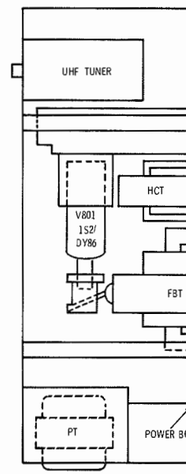
UB479
DATE 2-70 SET 1085 FOLDER 2





CHASSIS — SIDE VIEW



CHASSIS BOTTOM VIEW

CHASSIS AND PICTURE TUBE REMOVA

1. Remove all control knobs fr holding top cover of cabine

NOTE: Most components may be se

2. Remove six screws holding b

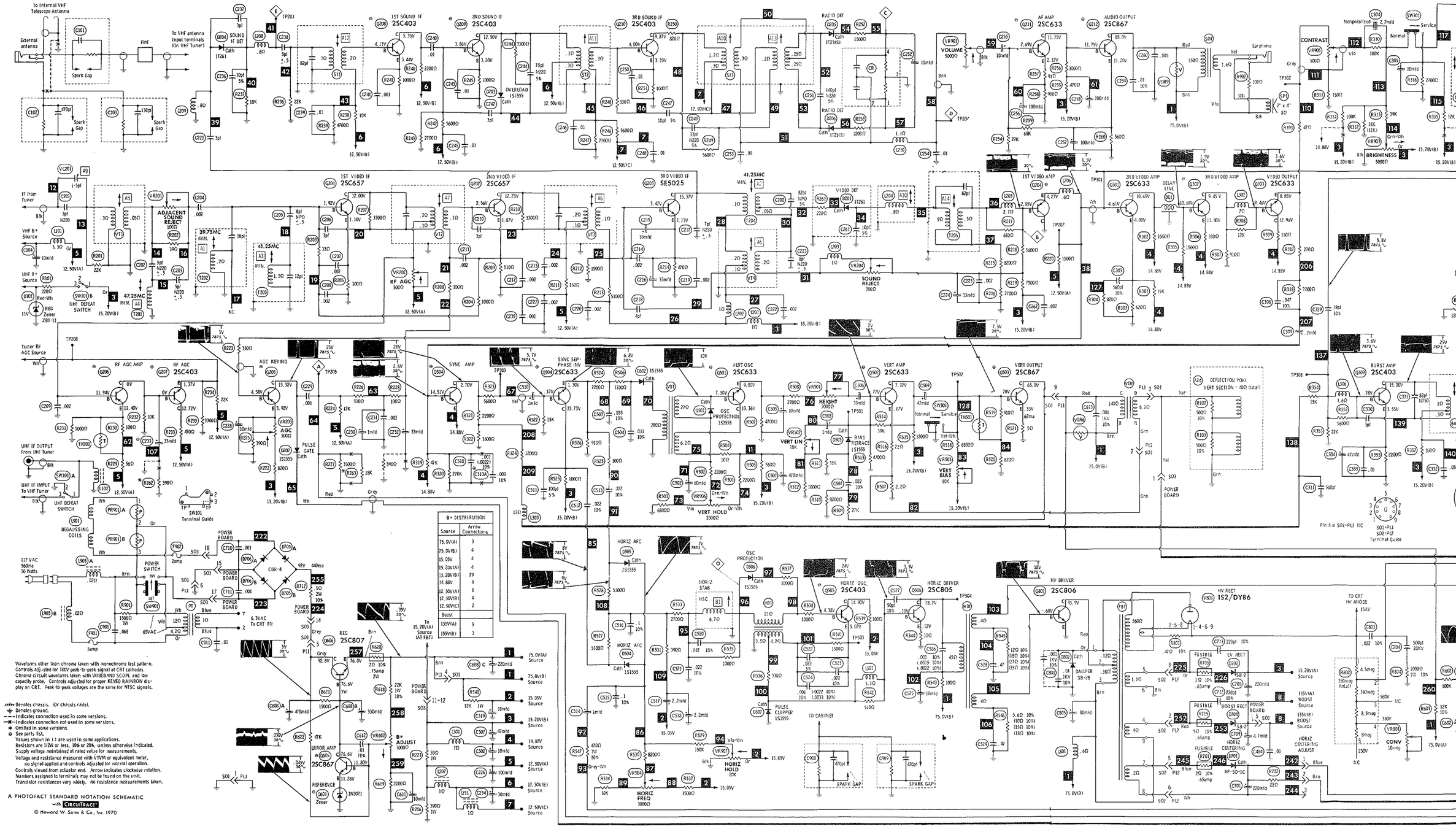
3. Remove two screws holding p board. Unplug power supply board.

4. Remove four screws from vi board and lower board down.

5. Remove three screws from ch lower board down.

6. Disconnect high-voltage and

RESISTANCE MEASUREMENTS
Pin No. | 50-30 | 1S2/DY86
1 | FIL | 500mag
2 | 100K ↑ | 4.5meg
3 | 120K †† | NC
4 | 120K †† | 500mag
5 | 600K † | NC
6 | 120K †† | 4.5meg▲
7 | 49K | TP
8 | FIL | 500mag
9 | 162.7mag | 614Ω †
↑ MEASURED FROM CATHODE OF Q703.
†† MEASURED FROM CATHODE OF Q704.
† MEASURED FROM CATHODE OF D802.
▲ MEASURED FROM CONVERGENCE LEAD OF TRINITRON PICTURE TUBE.
NC NO CONNECTION
TP TIE POINT
CONTRAST
BRIGHTNESS
COLOR
HUE
TILT
FOCUS ADJUST
HORIZ CENTERING ADJUST
1ST CHROMA BAND PASS 2SC318
2ND CHROMA BANDPASS 2SC352
3.58MC CONTROL 2SC403
3.58MC OSC 2SC403
3.58MC BUFFER 2SC352
BURST AMP 2SC403
ACC 2SC633
ACC KILLER DET
COLOR KILLER 2SC633
2ND VIDEO AMP 2SC633
3RD VIDEO AMP
VIDEO OUTPUT 2SC633
DELAY LINE
GREEN VIDEO AMP 2SC633
BLUE VIDEO AMP 2SC633
RED VIDEO AMP 2SC633
GREEN VIDEO OUTPUT 2SC795
BLUE VIDEO OUTPUT 2SC795
RED VIDEO OUTPUT 2SC795
GREEN DEMOD
BLUE DEMOD
RED DEMOD
GREEN DRIVE
BLUE DRIVE
RED DRIVE
GREEN BACK-GROUND
BLUE BACK-GROUND
RED BACK-GROUND
BOOST
HORIZ BLANKING AMP 2SC633
1ST PINCUSHION 2SC633
2ND PINCUSHION AMP 2SC633
3RD PINCUSHION AMP 2SC633
PINCUSHION OUTPUT 2SC756
HORIZ DEFLECTION OUTPUT 2SC806
DAMPER
TOP-BOT PINCUSHION
HV RECT 1S2/DY86
FUSIBLE
LV RECT
BOOST RECT
POWER BOARD
HORIZ CENTERING
HF-SD-1C
FOCUS RECT
FOCUS ADJUSTMENT TERMINALS
CONV
DEFLECTION YOKE
VERT SECTION = 40Ω (total)
HORIZ SECTION = 3.5Ω (total)
Transistor Terminal Guides
SO1-PL1 SO2-PL2 Terminal Guide
SO3 Terminal Guide
FBT Terminal Guide
To Plate Cap of HV RECT
TO CRT HV ANODE
CRT SD-30
NECK TWIST COIL
GUN CENTERING COIL
SONY MODEL KV-7010UA


To Internal VHF Telescope Antenna
External antenna
Spark Gap
FMT
To VHF antenna (on VHF Tuner)
1ST SOUND IF 2SC403
2ND SOUND IF 2SC403
3RD SOUND IF 2SC403
RATIO DET
AF AMP 2SC633
AUDIO OUTPUT 2SC867
VOLUME
CONTRAST
BRIGHTNESS
Earphone
1ST VIDEO IF 2SC657
2ND VIDEO IF 2SC657
3RD VIDEO IF SE5025
1ST VIDEO AMP
2ND VIDEO AMP 2SC633
3RD VIDEO AMP
VIDEO OUTPUT 2SC633
IF from Tuner
VHF B+ Source
UHF B+ Source
ADJACENT SOUND REJECT
SOUND REJECT
RF AGC
RF AGC AMP 2SC403
AGC KEYING
PULSE GATE
SYNC AMP
SYNC SEP-PHASE INV 2SC633
VERT OSC 2SC633
VERT AMP 2SC633
VERT OUTPUT 2SC867
HEIGHT
VERT LIN
VERT BIAS
VERT HOLD
DEFLECTION YOKE
VERT SECTION - 40Ω (total)
BURST AMP 2SC403
UHF IF OUTPUT From UHF Tuner
UHF IF INPUT To VHF Tuner
UHF DEFEAT SWITCH
DEGAUSSING COILS
117 VAC 560ma 56 Watts
POWER SWITCH
Terminal Guide
REG 2SC807
REFERENCE
ERROR AMP 2SC867
B+ ADJUST
HORIZ AFC
OSC PROTECTION
HORIZ OSC. 2SC403
HORIZ DRIVER 2SC805
HORIZ STAB
HORIZ FREQ
HORIZ HOLD
PULSE CLIPPER
TO CABINET
SPARK GAP
HV DRIVER 2SC806
HV RECT 1S2/DY86
TO CRT HV ANODE
FUSIBLE
LV RECT
BOOST RECT
HORIZ CENTERING
CONV
B+ DISTRIBUTION
Source
Arrow Connections
Boost
Waveforms other than chroma taken with monochrome test pattern. Controls adjusted for 100V peak-to-peak signal at CRT cathodes. Chroma circuit waveforms taken with VIDEOSCOPE and low capacity probe. Controls adjusted for proper KEYED RAINBOW display on CRT. Peak-to-peak voltages are the same for NTSC signals.
Denotes chassis. (Or chassis rails).
Denotes ground.
Indicates connection used in some versions.
Indicates connection not used in some versions.
Omitted in some versions.
See parts list.
Values shown in ( ) are used in some applications.
Resistors are 1/2W or less, 10% or 20%, unless otherwise indicated.
Supply voltage maintained at rated value for measurements.
Voltage and resistance measured with VTVM or equivalent meter, no signal applied and controls adjusted for normal operation.
Controls viewed from actuator end. Arrow indicates clockwise rotation.
Numbers assigned to terminals may not be found on the unit.
Transistor resistances vary widely. No resistance measurements taken.
A PHOTOFACT STANDARD NOTATION SCHEMATIC with CIRCUITRACE
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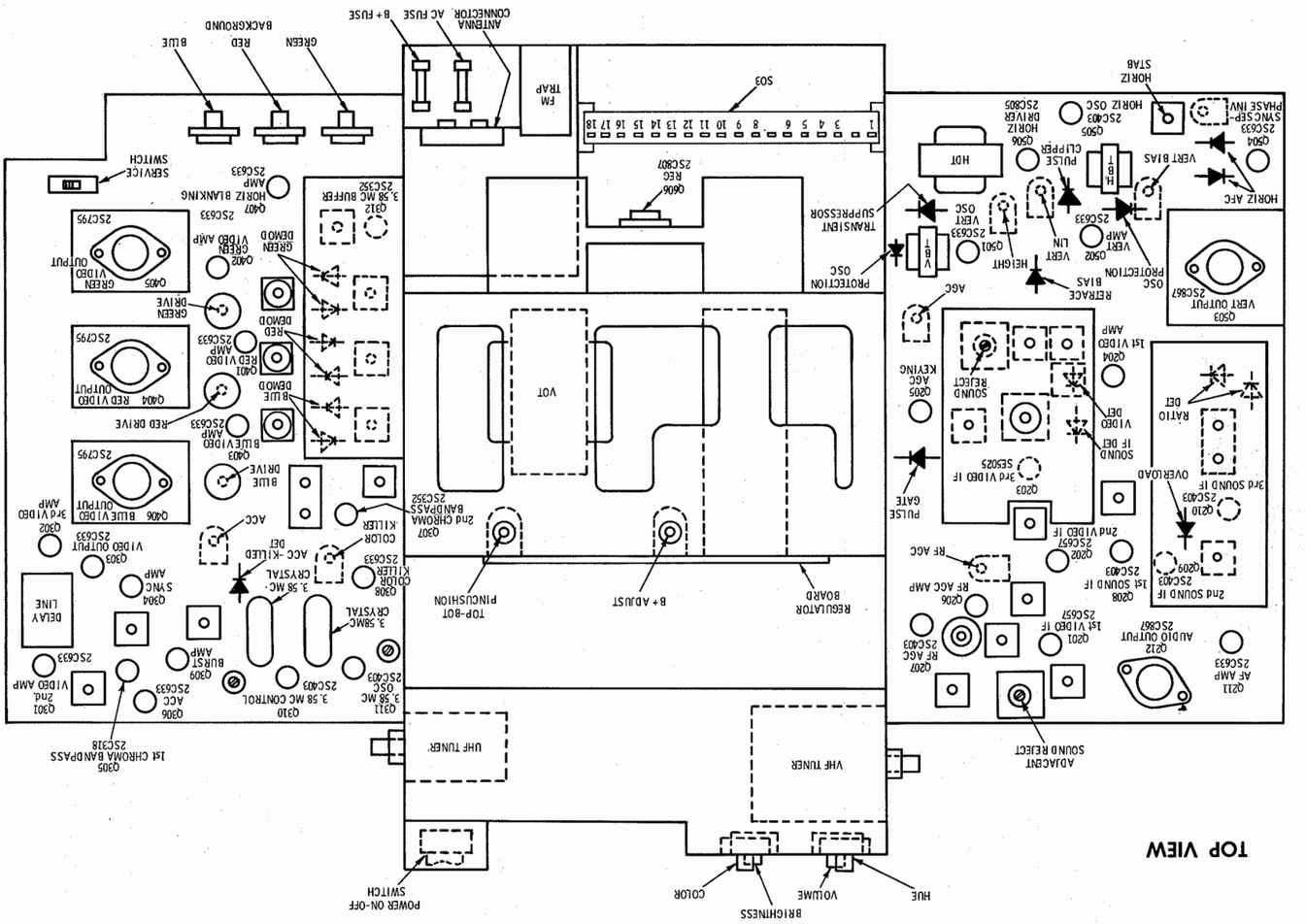
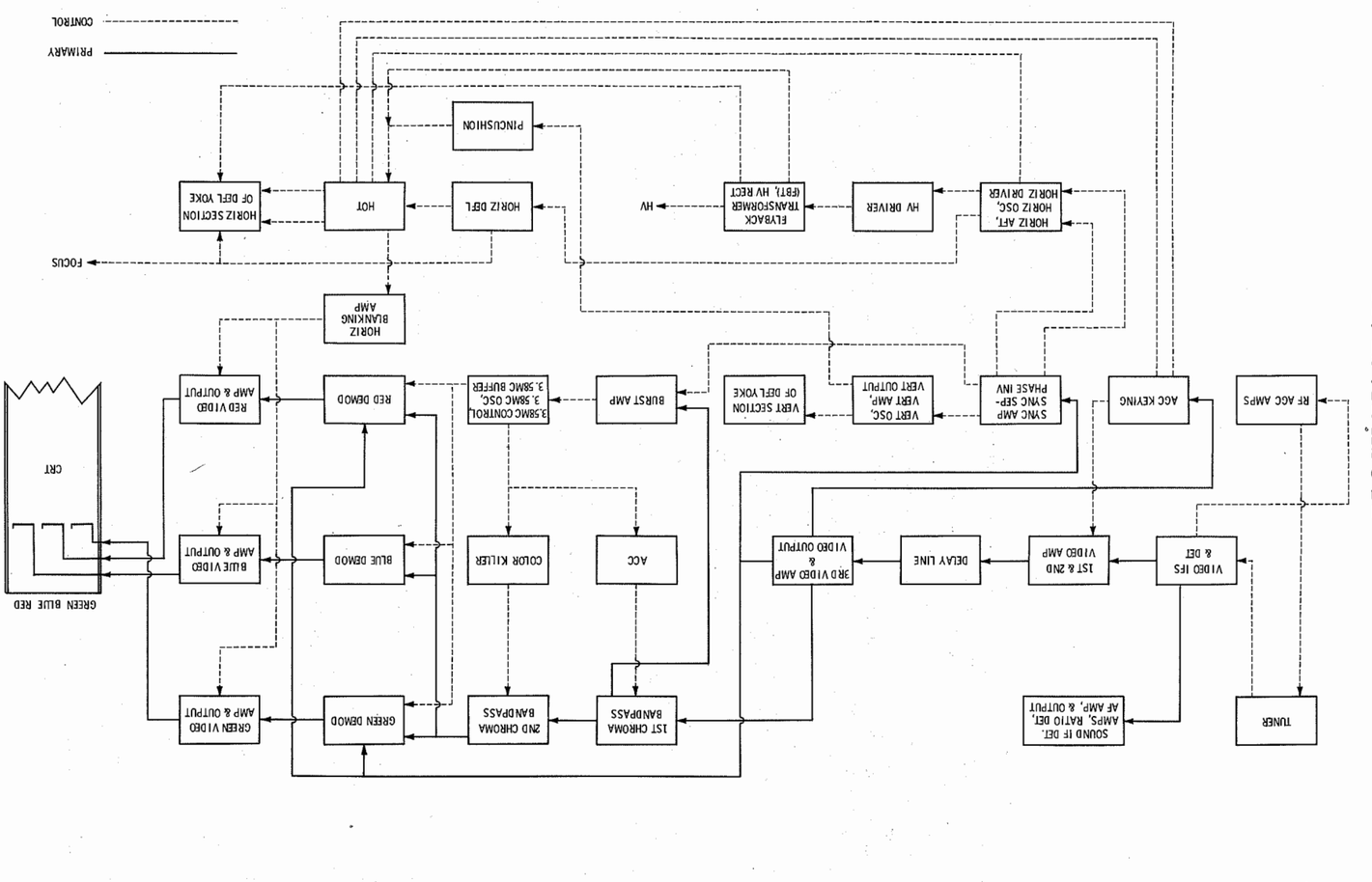
TRANSISTOR PLACEMENT CHART





TV ALIGNMENT INSTRUCTIONS

Use an isolation transformer, or observe polarity, and maintain voltage at 117VAC.
Allow a 20-minute warm-up period for the receiver and test equipment.

Suggested Alignment Tools:	GENERAL CEMENT	WALSCO
A1,A3,A5 thru A8, A12, A14 thru A22, Mixer Collector Coil	9440	2501
A2,A4	8606, 8606L, 8869	2543, 2544, 2588
A9	8277	2505
A10,A11,A13	9087	2528

VIDEO IF ALIGNMENT

Connect the synchronized sweep voltage from the sweep generator to the horizontal input of the oscilloscope for horizontal deflection. Use only enough generator output to provide a usable indication. Note: Response may vary slightly from that shown. Connect a 2.2V fixed bias to tuner AGC line. Connect a 0-7V variable bias supply to the IF AGC line (Point ◇A◇) and adjust to obtain a response curve which shows no indication of overload. Disable oscillator in VHF tuner. Set the channel selector to any non-interfering channel.

INDICATOR	SWEEP GENERATOR COUPLING	SWEEP GENERATOR FREQUENCY	MARKER GENERATOR FREQUENCY	ADJUST	REMARKS
DC probe of VTVM thru 47K to Point ◇B◇, common to ground.	High side thru a .002mfd cap. to Point ◇U◇ on VHF Tuner, low side to ground.		39.75MC 41.25MC 47.25MC	A1 A2,A3, VR204 A4,VR201	Adjust for MINIMUM.
Vertical input of scope to Point ◇B◇, low side to ground.	"	44MC (10MC Sweep)	39.75MC 41.25MC 42.17MC 44.00MC 45.75MC 47.25MC	A5,A6 A7,A8 A9 and Mixer Collector Coil	Adjust for maximum amplitude and MINIMUM tilt with markers as shown in Figure 1.

VIDEO DETECTOR COIL ADJUSTMENT

Adjust L204 (A30) for best picture detail and best picture stability.

SOUND IF ALIGNMENT

SIGNAL GENERATOR COUPLING	SIGNAL GENERATOR FREQUENCY	CHANNEL	CONNECT VTVM	REMARKS
High side thru .002mfd cap.to Point ◇E◇, common to ground.	4.5MC (Unmod.)		DC probe to Point ◇C◇, low side to ground.	Adjust A10, A11 and A12 for maximum.
"	"		DC probe to Point ◇D◇, low side to ground.	Adjust A13 for zero. A positive or negative reading will be obtained on either side of the correct setting.

4.5MC TRAP ALIGNMENT

Tune in a strong TV signal and set the contrast at maximum. Adjust the fine tuning until a beat pattern is visible on the screen. Adjust A14 for MINIMUM beat interference.

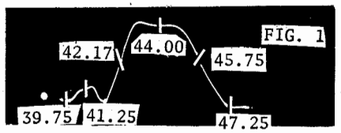


FIG. 1

MISCELLANEOUS ADJUSTMENTS (CONTINUED)

DYNAMIC CONVERGENCE TILT CONTROL ADJUSTMENT

Connect a keyed rainbow generator to the set and use a crosshatch pattern. Adjust the tilt control, VR701, while observing the outside vertical bars. Adjust tilt control for best convergence.

TOP - BOTTOM PINCUSHION ADJUSTMENT

Connect a keyed rainbow generator to the set and use a crosshatch pattern. Adjust Top-Bottom Pincushion control, VR601, for straight vertical and horizontal lines. The vertical lines are the the most important of the two. Make sure vertical lines are straight.

HORIZONTAL CONVERGENCE ADJUSTMENT

Connect a keyed rainbow generator to the set and use a vertical line pattern. Adjust Convergence Adjust, VR801 control, for best horizontal convergence of the bars on the left and right sides of the picture. If bars fail to be converged properly, use taps provided on R802 and adjust convergence Adjust, VR801 control, for best convergence of bars.

NECK TWIST COIL

This coil is used for beam alignment. Deflection centers should be in a horizontal line. The yoke plug mates with two of the four pins on the convergence board. One terminal of the plug must connect to the unnumbered ground terminal. By reversing the plug, six adjustment positions are available for proper beam alignment.

GUN CENTERING

Centering Control, VR702, is used for fine adjustment. Course adjustment is provided by mating the Gun Centering coil plug with two of the three pins on the convergence board. By reversing the plug, four adjustment positions are available.

The Gun Centering coil, located directly behind the Neck Twist coil, affects the first point of electron beam crossover. Should the centering coil require replacement, note its position before removing.

COLOR DEMODULATOR ALIGNMENT

Suggested Alignment Tools:	GENERAL CEMENT	WALSCO
A27, A28, A29	9440	2501

Connect a keyed rainbow generator and set Hue control to the center of its range.

CONNECT SCOPE	ADJUST	REMARKS
Collector Q404	A27	Obtain a 6th bar crossover (see waveforms on schematic).
Collector Q405	A28	Obtain a 3 1/2 and a 9 1/2 bar at zero (see waveforms on schematic).
Collector Q406	A29	Obtain a 7 1/2 and a 1 1/2 bar at zero (see waveforms on schematic).

BURST AMP ADJUSTMENT

Suggested Alignment Tools:
A23 - GENERAL CEMENT 9440 ..... WALSCO 2501
A24 - GENERAL CEMENT 8721,8722, WALSCO 8721,2519

Connect a keyed rainbow generator and tune in a rainbow pattern. Connect vertical lead of scope to base of Q310. Adjust A23 and A24 for maximum.

3.58MC OSCILLATOR ADJUSTMENT

Suggested Alignment Tools:
A25 - GENERAL CEMENT 8721,8722, WALSCO 8721,2519
A26 - GENERAL CEMENT 9440 ..... WALSCO 2501

Connect a keyed rainbow generator and tune in a color bar test pattern. Connect a jumper from test point ◇N◇ to ground. Set the Hue control to center of its range. Advance Color control approximately two-thirds of its range. Adjust A25 until color bars tend to float slowly across screen or stand still. Connect scope to test point ◇O◇, low side to ground. Adjust A22 for maximum output. Remove jumper. Slightly adjust A26 for proper color rainbow sequence across screen.

MISCELLANEOUS ADJUSTMENTS

HORIZONTAL SWEEP CIRCUIT ADJUSTMENT

Tune in a TV station and adjust all controls for normal operation. Disconnect AC from set and unsolder lead at C510 (CircuiTrace 67). Set horizontal hold control to center of its range. Adjust Horizontal Frequency control, VR504, for slowly floating picture. Connect scope to test point ◇Q◇ and observe the waveform at a sweep rate of 7875 cycles per second. Adjust horizontal Stabilizer coil slug, B1, for a waveform with equal peaks as shown in Fig. 4. If necessary, readjust horizontal frequency control for a slowly floating picture. Reconnect sync lead at C510 (CircuiTrace 67). Picture should lock in with horizontal hold control.

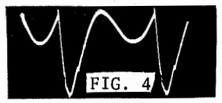


FIG. 4

FOCUS ADJUSTMENT

Tune in a TV station and adjust contrast and brightness for normal picture. Adjust Focus control, VR703, for good definition and picture detail. Alternately adjust Height, VR501, Vertical Linearity, VR502, and Vertical Bias, VR503 controls to produce a linear picture with about 1/4" overscan at top and bottom of picture tube.

LOW VOLTAGE POWER SUPPLY ADJUSTMENT

Connect a VTVM to CircuiTrace #1 and adjust B+ Adjust, VR602 control, to obtain 75 volts at CircuiTrace #1.

AUTOMATIC COLOR CONTROL ADJUSTMENT

Tune in a weak color signal or reduce the signal at the antenna terminals. Adjust ACC control, VR301, for color elimination. Turn ACC control back until best color is obtained.

KILLER CONTROL ADJUSTMENT

Tune in a weak signal or reduce the signal at antenna terminals to obtain a snowy picture. Adjust the Color Killer control, VR302, to eliminate color in the snow. Check with a color signal to make sure killer is not eliminating picture coloring.

AGC CONTROL ADJUSTMENT

The RF AGC control, VR202, is threshold control for tuner AGC system and should be adjusted using the strongest signal in the area. In order to see the point of threshold, turn contrast control to maximum. Adjust RF AGC control, VR202, for snowy picture. Then turn control the other direction until horizontal pulling is noted. Back off control until picture becomes clear.

For adjustment of AGC control, VR203, turn contrast control to MINIMUM, tune the TV to the strongest signal in the area and turn AGC control, VR203, fully counterclockwise and observe a low contrast level. Turn AGC control, VR203, fully clockwise, and observe snowy picture. Adjust AGC control, VR203, for maximum contrast and MINIMUM snow. Set contrast control for normal operation.

GRAY SCALE ADJUSTMENT

Turn the red, blue and green video drive controls fully counterclockwise. Turn red, green, and blue background controls fully counterclockwise. Turn tuner to any non-interfering channel. Set brightness at maximum, contrast at MINIMUM. Move the normal-service switch to Service position. Advance background controls one at a time until a barely visible line appears on screen. Then back off until line barely disappears. Then move the normal-service switch to Normal position. Adjust brightness for normal viewing. Tune in a black and white picture or a color picture with the color control set at MINIMUM. Adjust contrast for normal viewing. Adjust the red, blue and green drive controls to eliminate coloring in the dark and bright areas of picture.

PURITY ADJUSTMENT

To gain access to the purity adjustment the power supply unit located above the yoke must be removed. Remove four screws and unplug power supply. Remove two screws on the video printed circuit board and let it rest on its cords. Plug power supply in again at the rear of the chassis.

Degaussing is seldom needed because of the degaussing circuit built into set. If picture tube and tube mounting brackets appear to be magnetized use external degaussing coil to demagnetize picture tube and tube mounting brackets.

Turn blue and green background controls fully counterclockwise and turn red background for strong red on the picture tube. Turn the set to non-interfering channel. Loosen yoke brackets and move yoke rearward until it is against the convergence lead located in the middle of the picture-tube neck. Adjust the tabs located on the purity magnet until a red vertical bar is centered on the picture tube. Move the yoke forward to obtain a uniform red over the entire picture-tube face. When completed, tighten yoke brackets making sure the picture is straight.

CHROMA BANDPASS ALIGNMENT

The following alignment will require the use of an RF modulator (RCA WG304B or equivalent) and Video Multimarker (RCA WG295C or equivalent). Connect a 0-7 volt bias supply to Point ◇A◇, negative to ground. Connect a jumper from Point ◇F◇ to ground and a jumper from Point ◇G◇ to ground. Use only enough signal to give usable indication. Set color control to approximately 2/3 of its range. Set hue control in center of its range, channel selector to any non-interfering channel.

SWEEP GENERATOR COUPLING	SWEEP GENERATOR FREQUENCY	MARKER GENERATOR FREQUENCY	CONNECT SCOPE	REMARKS
High side through .001 cap. to test point ◇B◇, low side to ground.	3.58MC (3 5MC Sweep)	3.08MC 3.58MC 4.08MC	Vert. amp thru demodulator probe to test point ◇L◇, low side to ground.	Adjust A19 and A20 for response curve as shown in Fig. 2.
"	3.58MC (3-5MC Sweep)	3.08MC 3.58MC 4.08MC	Vert. amp thru demodulator probe to test point ◇M◇, low side to ground.	Adjust A21 and A22 for response curve as shown in Fig. 3.
3.58MC TRAP ALIGNMENT				
High side thru .001mfd cap. to ◇H◇, low side to ground.	3.58MC (Unmod.)		To Test Point ◇H◇, low side to ground.	Adjust A15 for MINIMUM indication on scope.
High side thru .001mfd cap. to ◇I◇, low side to ground.	3.58MC (Unmod.)		To base of Q401, low side to ground.	Adjust A16 for MINIMUM indication on scope.
High side thru .001mfd cap. to ◇J◇, low side to ground.	3.58MC (Unmod.)		To base of Q402, low side to ground.	Adjust A17 for MINIMUM indication on scope.
High side thru .001mfd cap. to ◇K◇, low side to ground.	3.58MC (Unmod.)		To base of Q403, low side to ground	Adjust A18 for MINIMUM indication on scope.

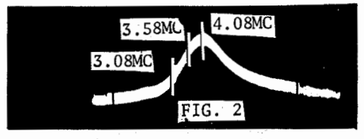


FIG. 2

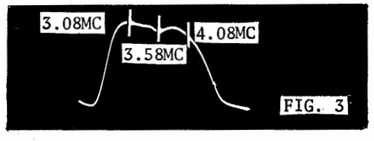
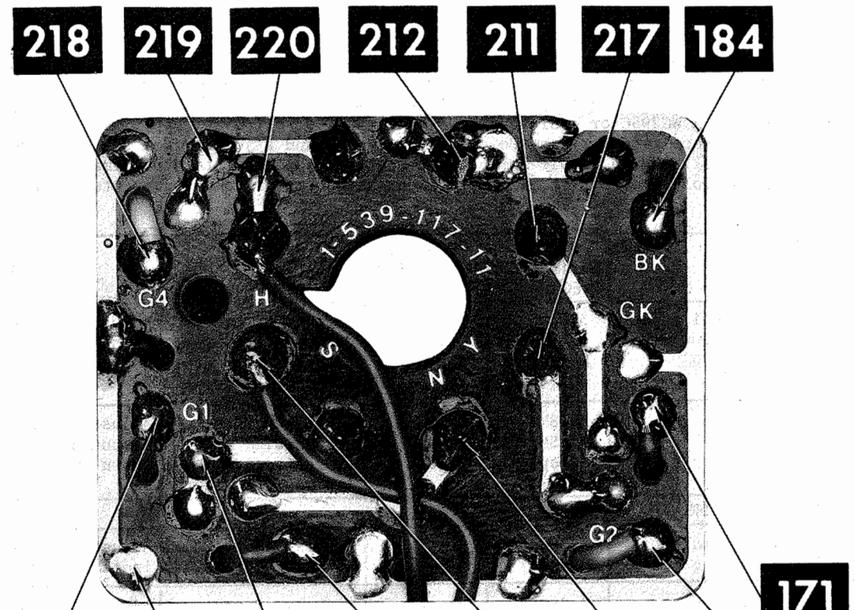
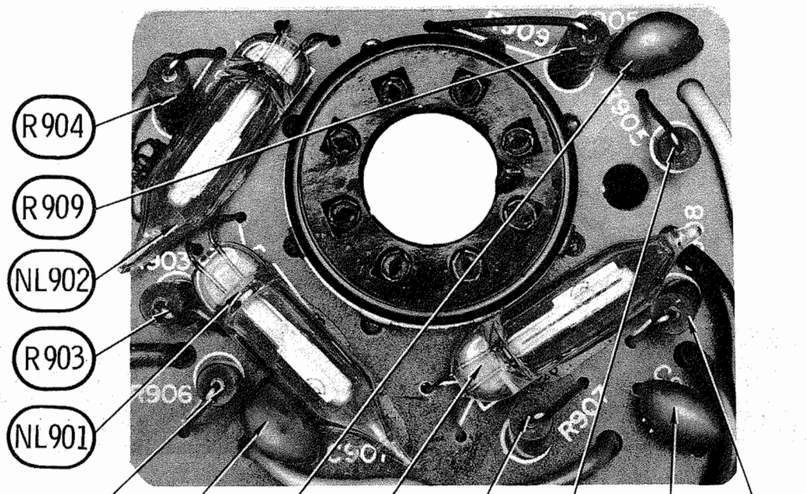


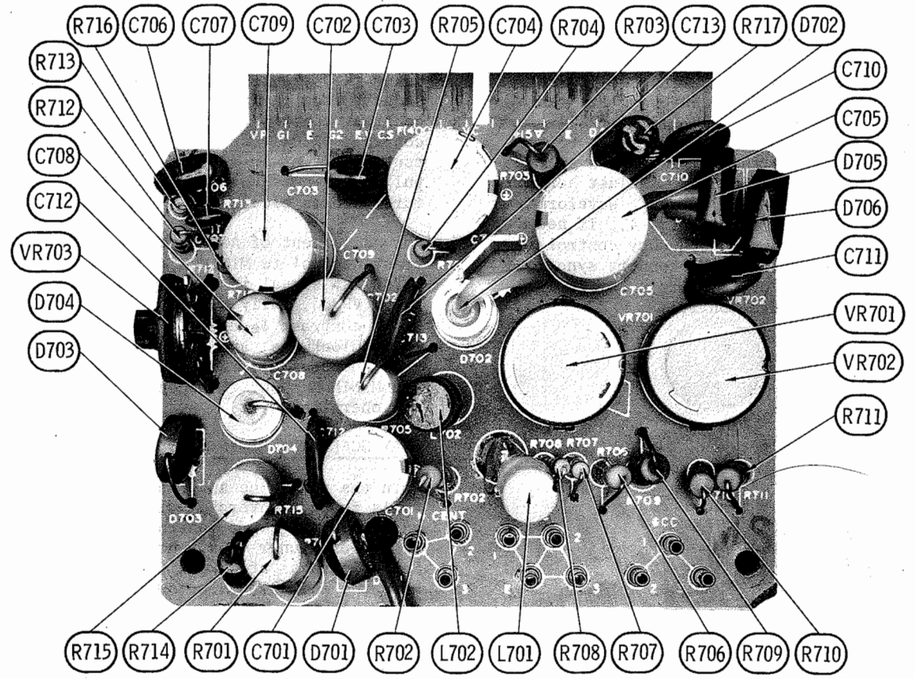
FIG. 3

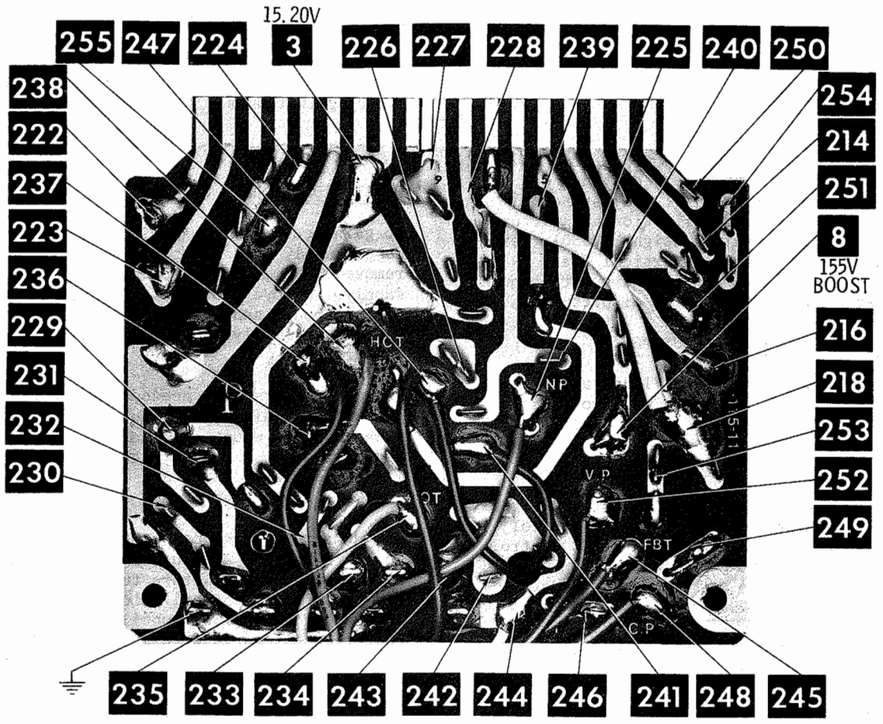




Howard W. Sams CIRCUITRACE Photo

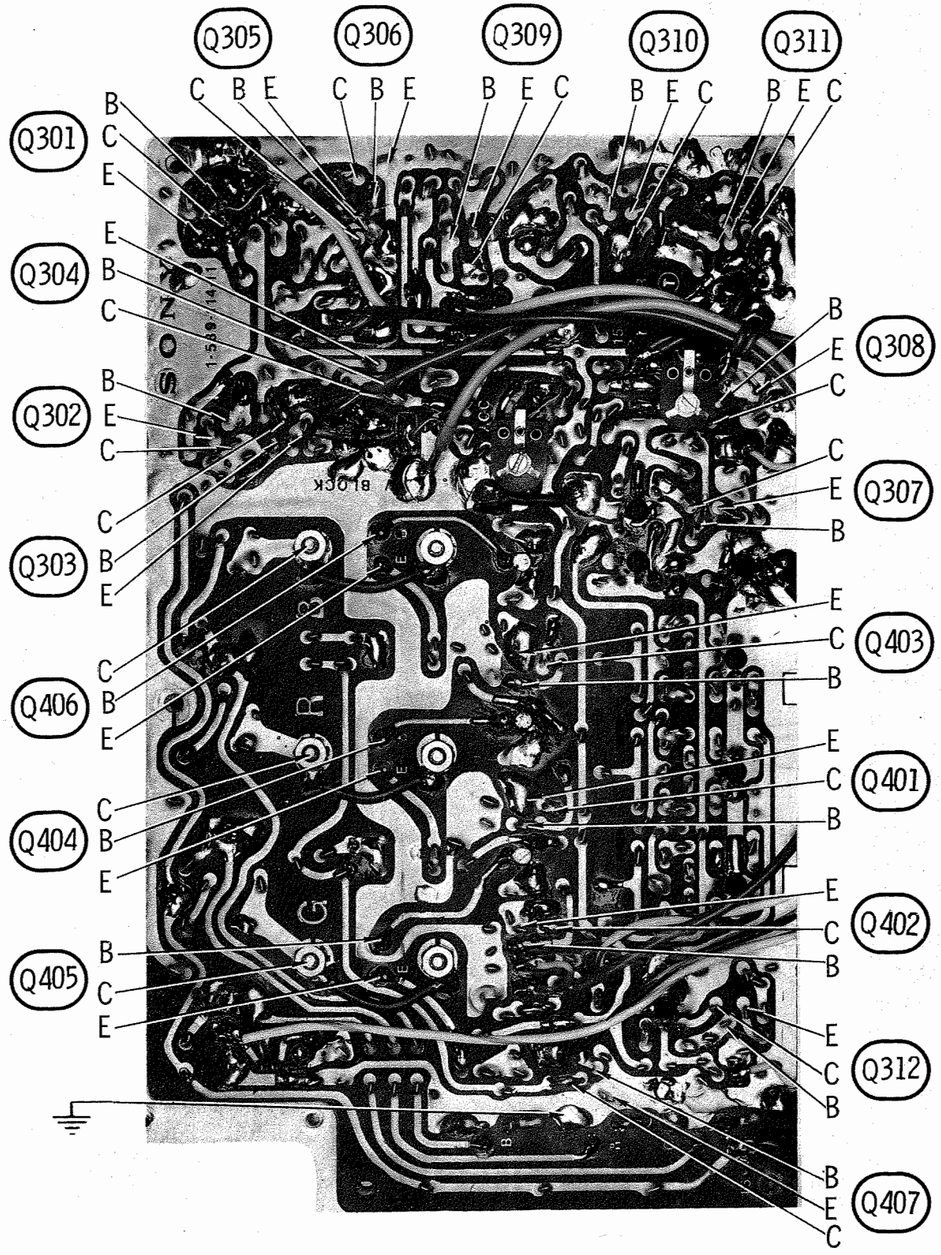
PICTURE TUBE SOCKET BOARD



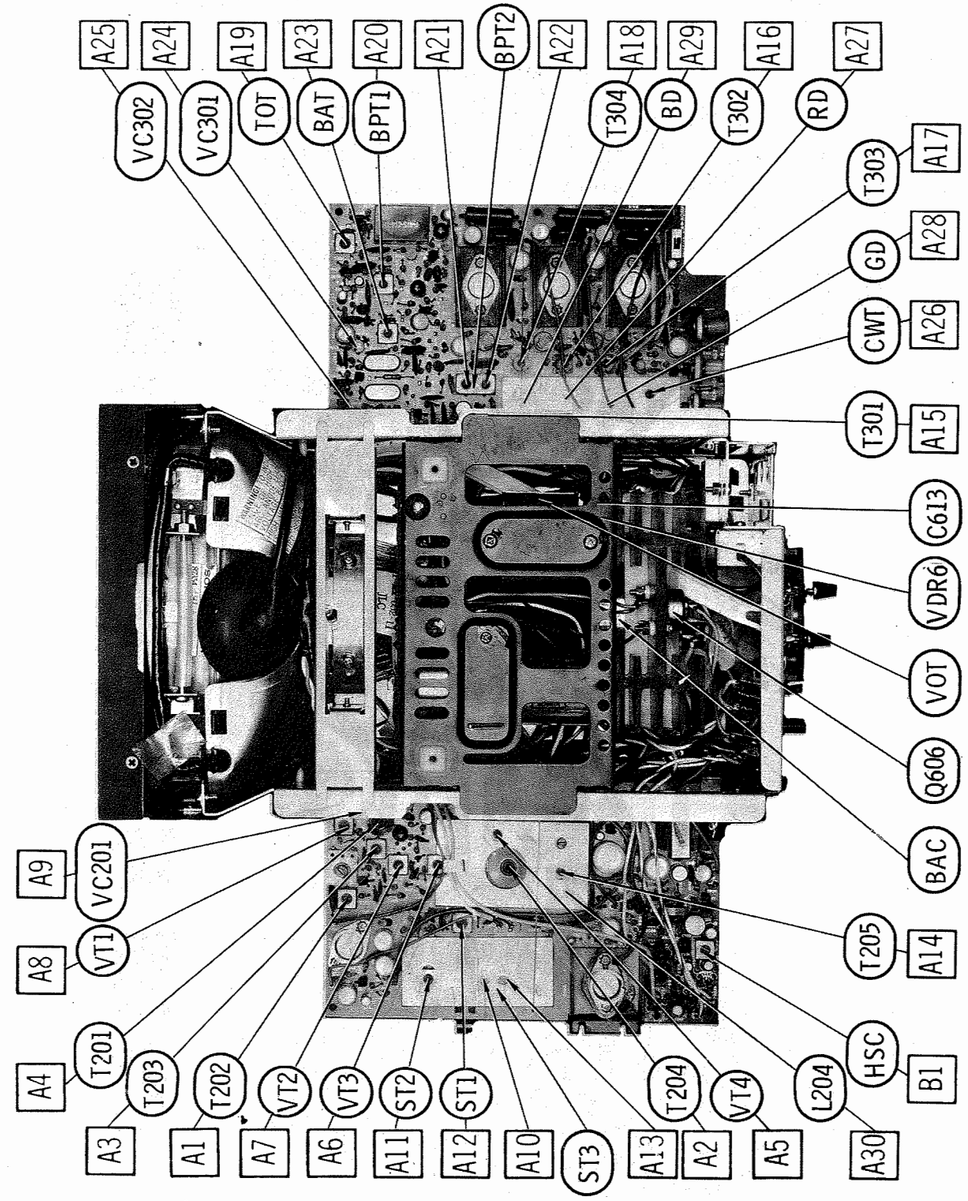


POWER SUPPLY SOUND

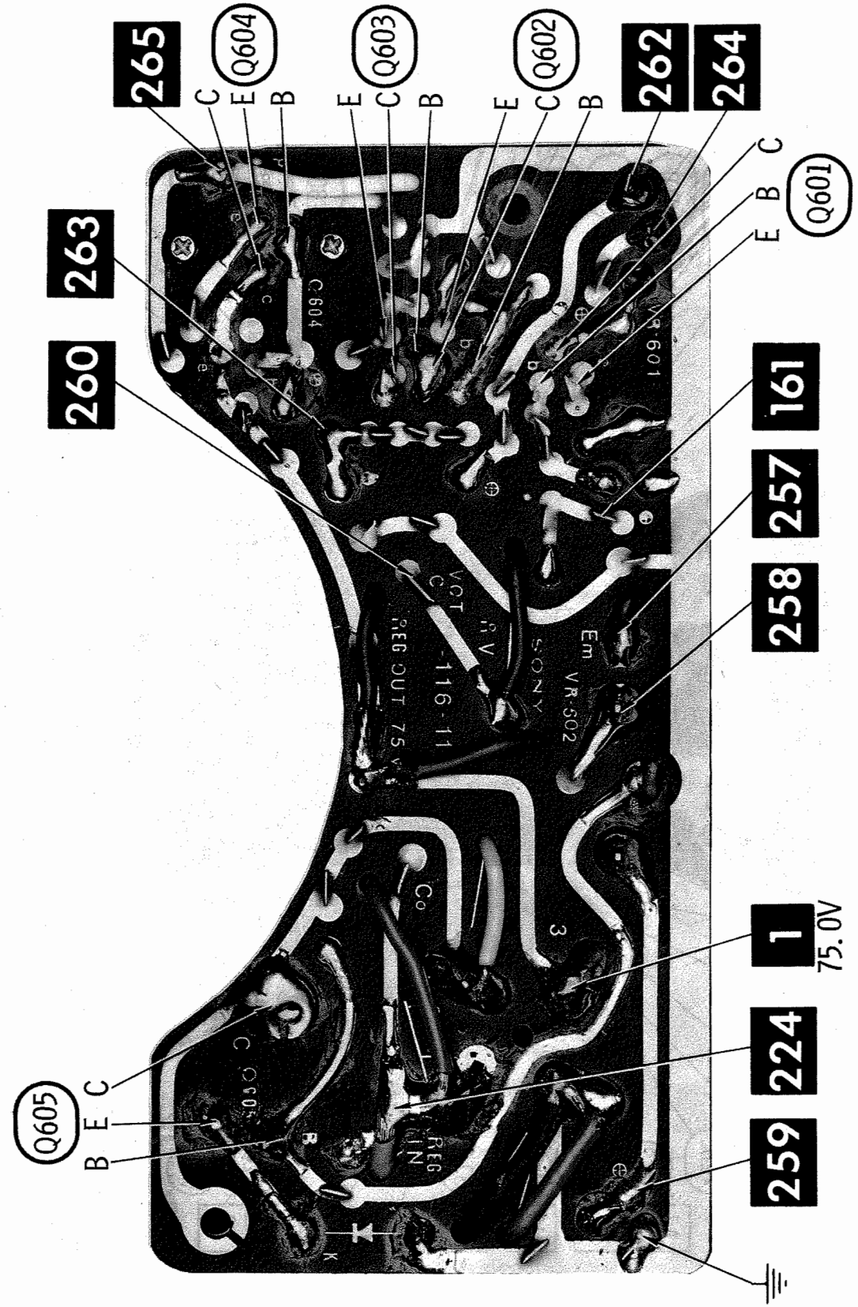
Howard W. Sams CIRCUITRACE Photo



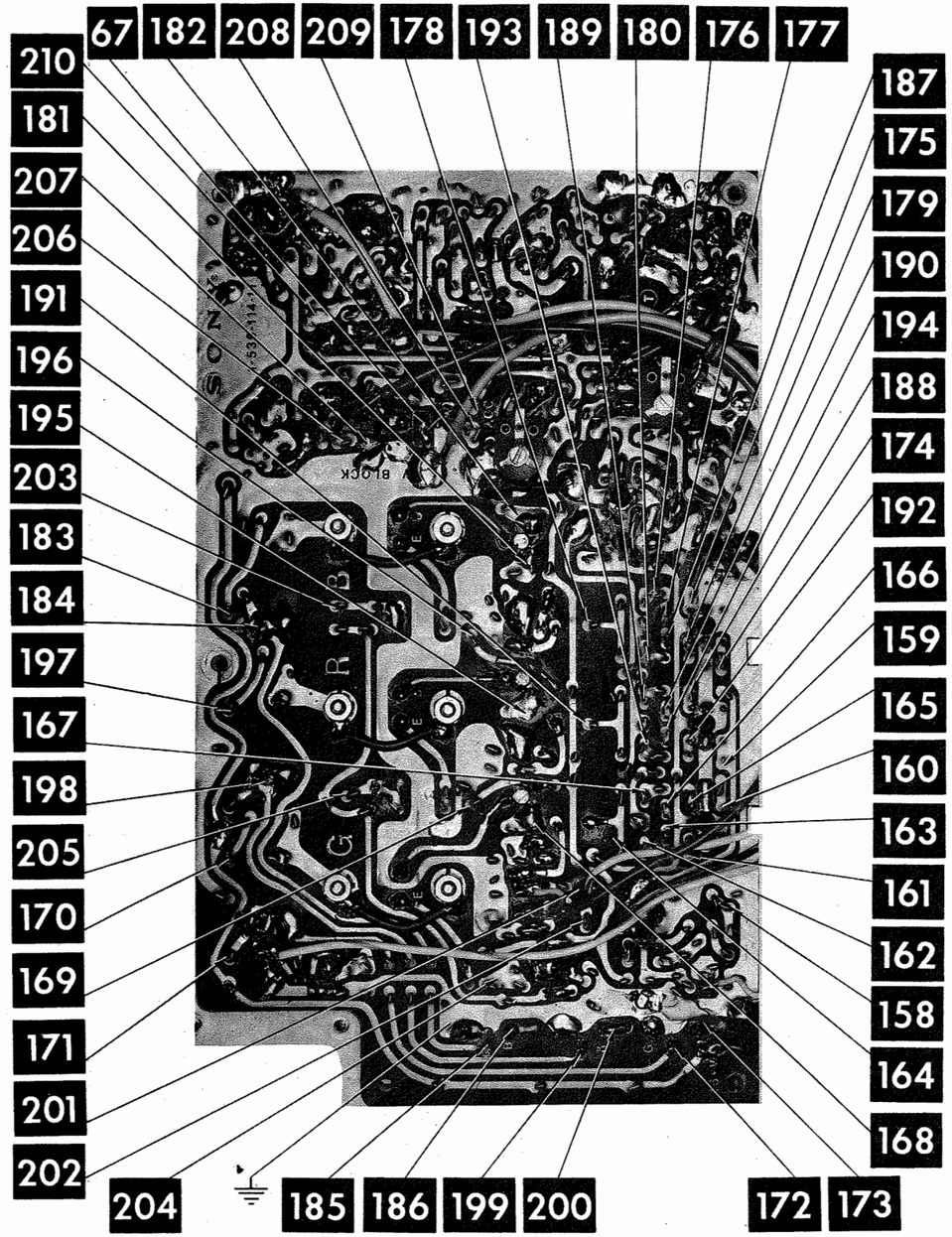
CHROMA — VIDEO OUTPUT BOARD



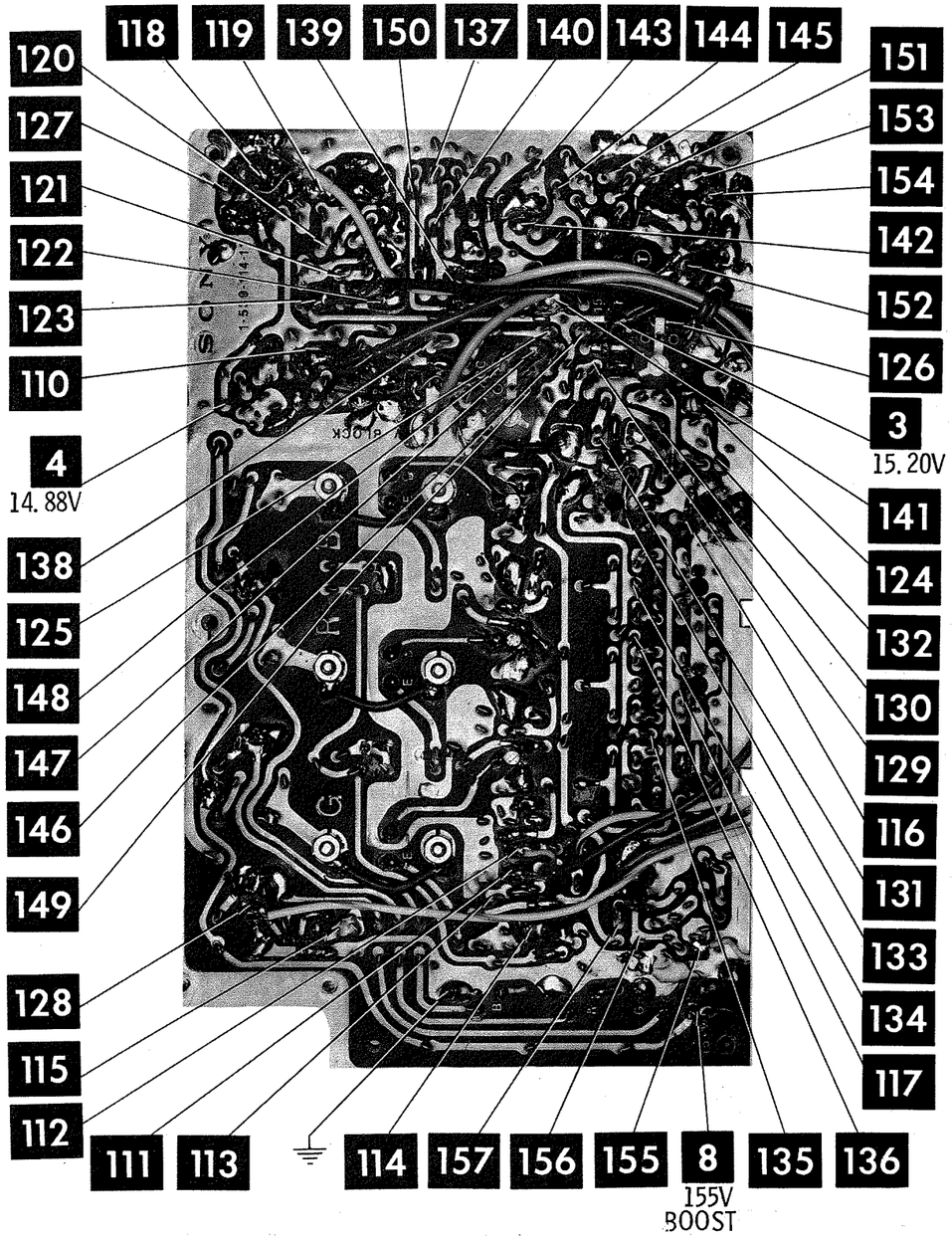
CHASSIS — TOP VIEW



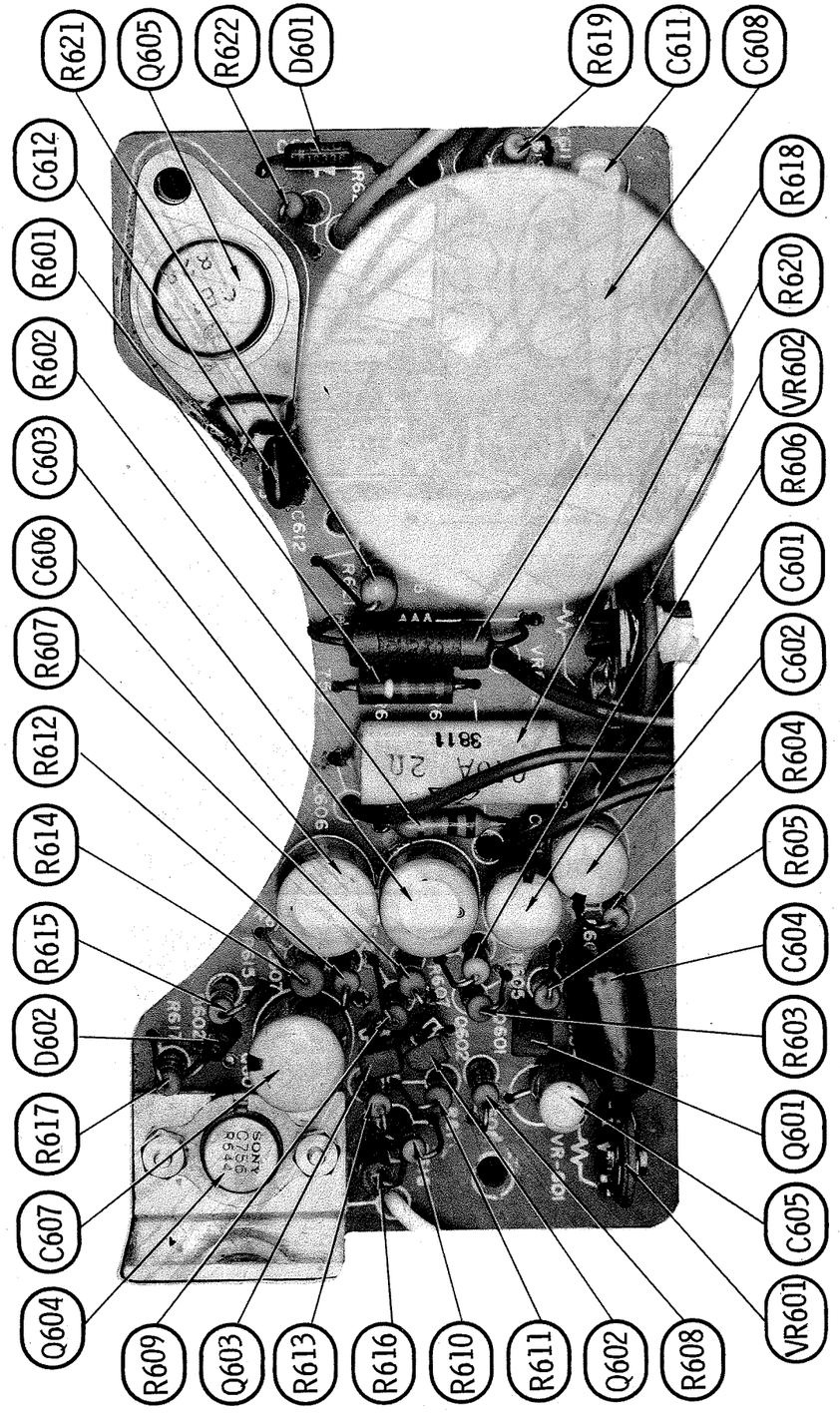
Howard W. Sams CIRCUITRACE™ Photo VOLTAGE REGULATOR BOARD



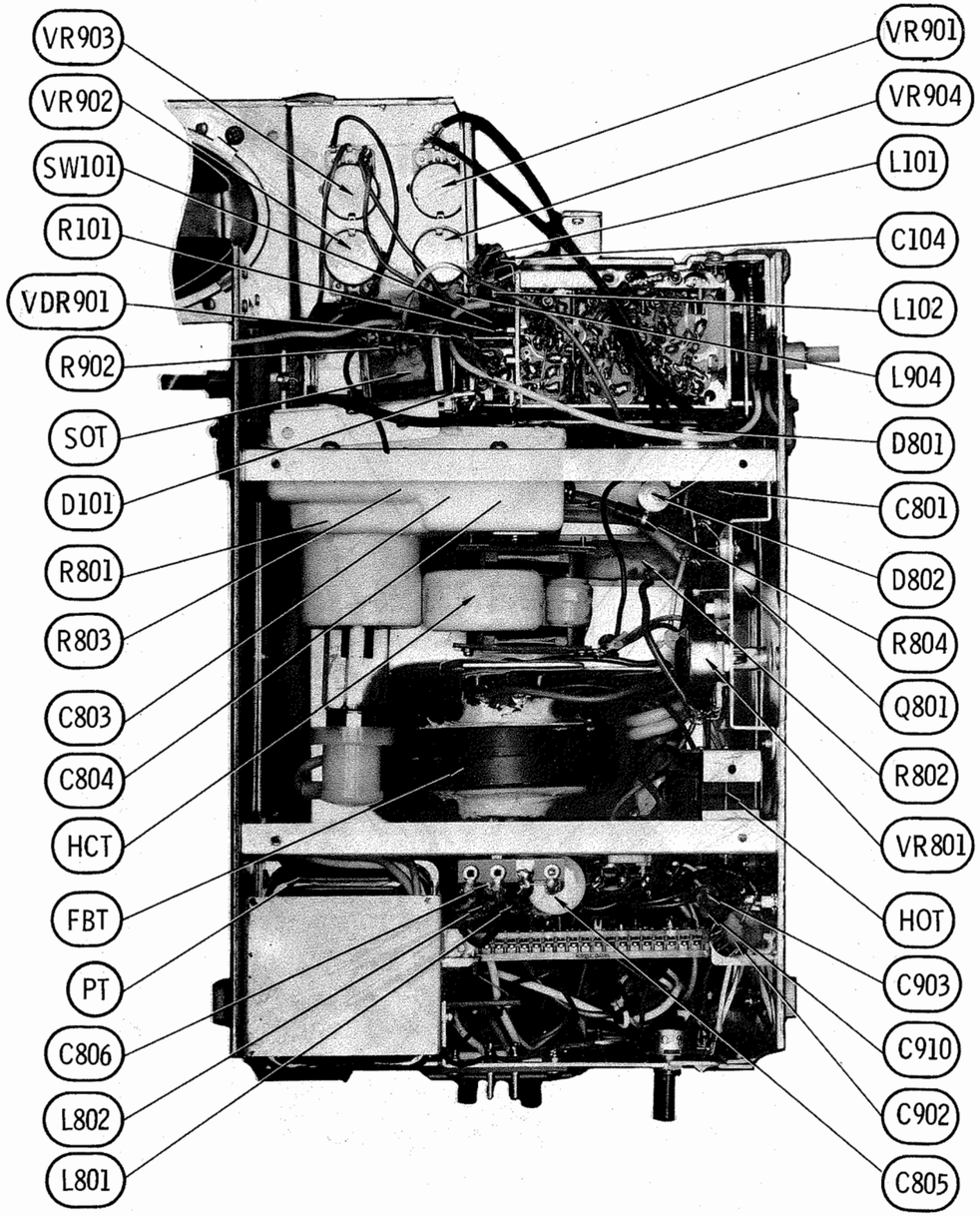
CHROMA — VIDEO OUTPUT BOARD Howard W. Sams CIRCUITRACE™ Photo



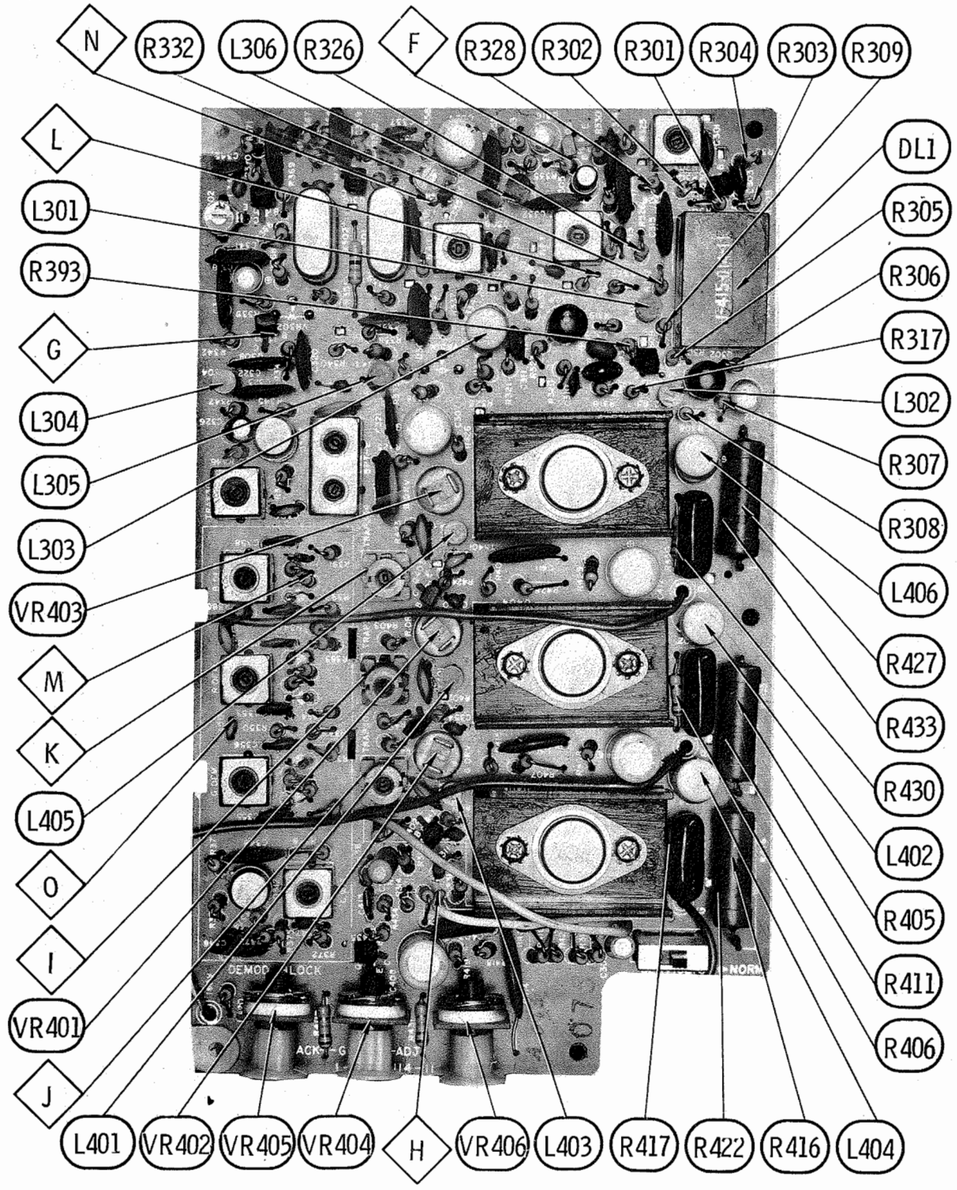
Howard W. Sams CIRCUITRACE Photo CHROMA — VIDEO OUTPUT BOARD



VOLTAGE REGULATOR BOARD



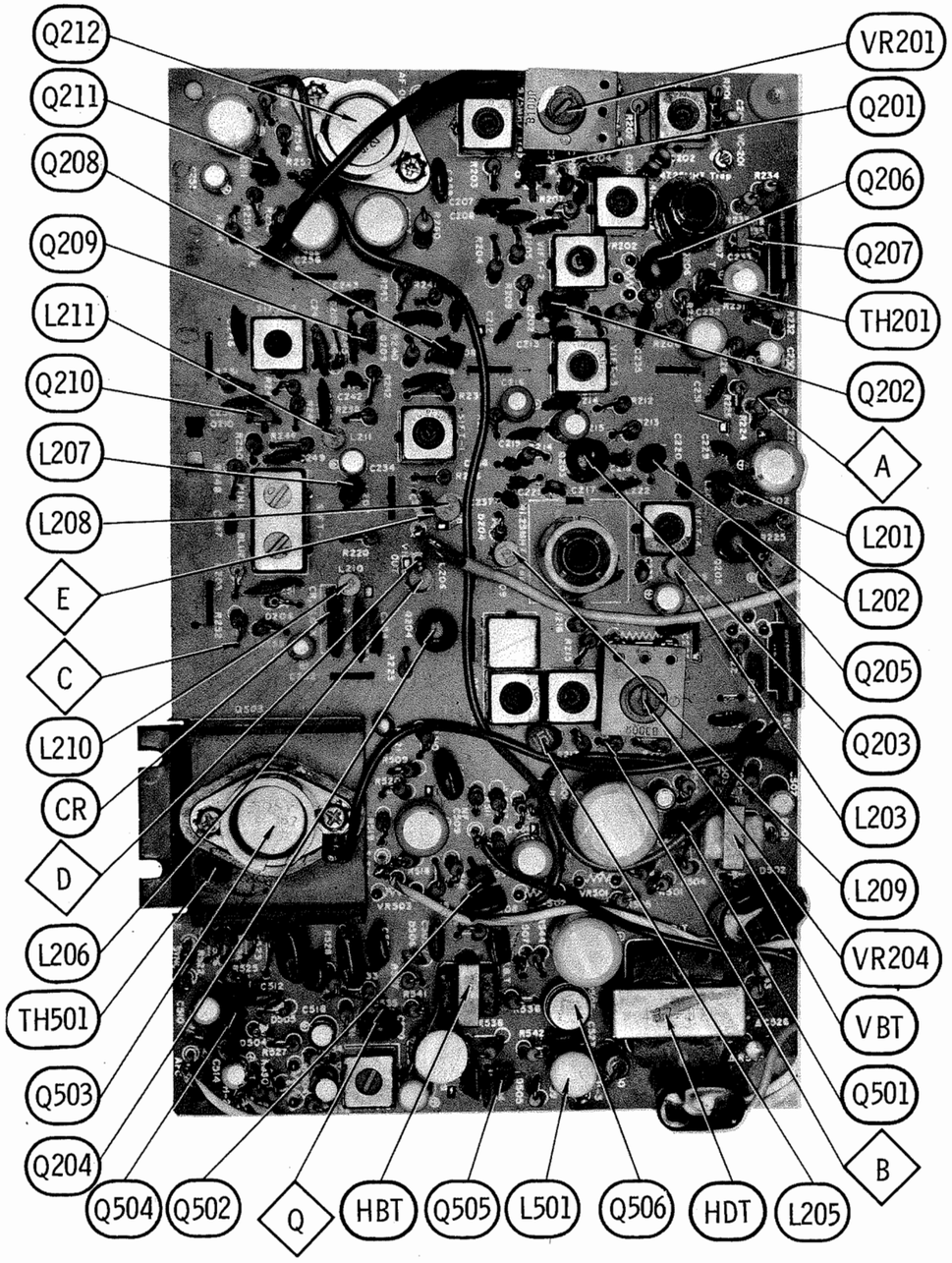
CHASSIS – BOTTOM VIEW



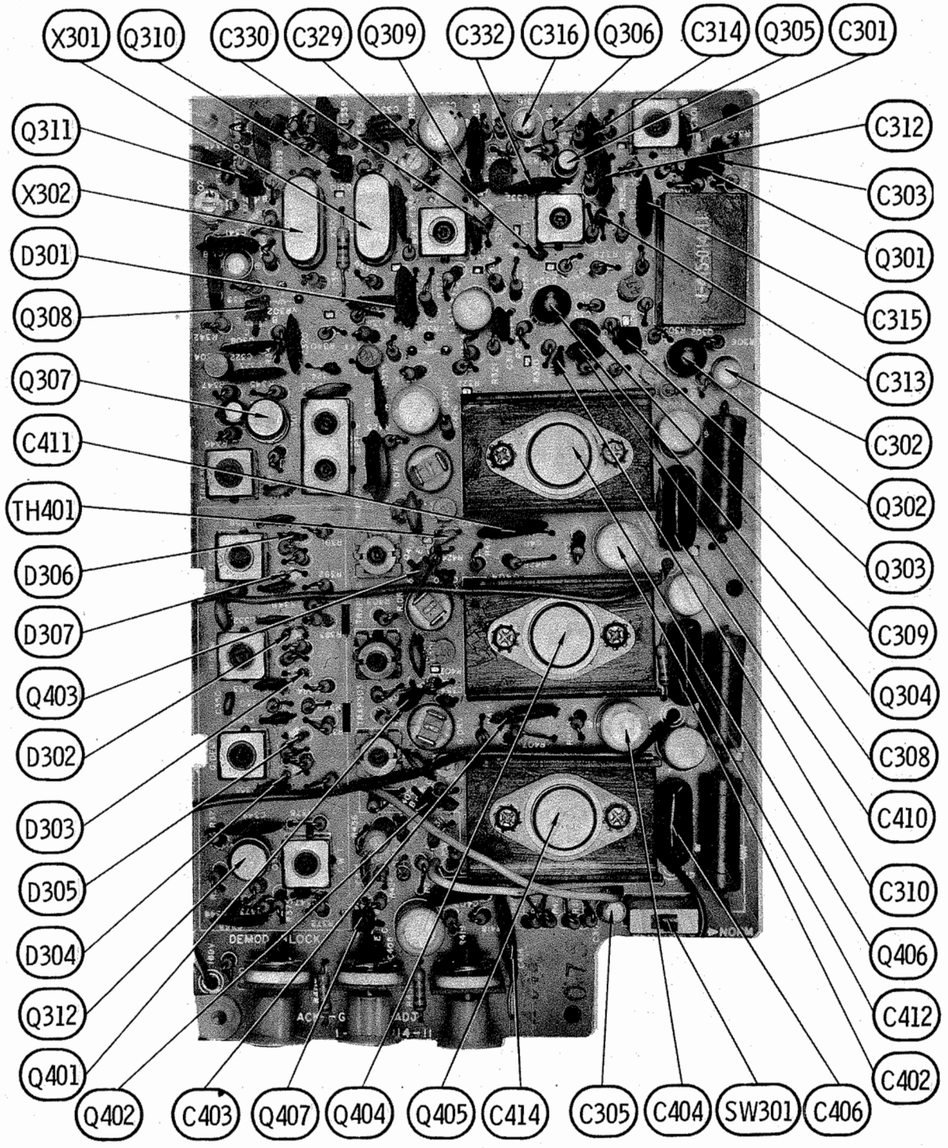
CHROMA – VIDEO OUTPUT BOARD

CHROMA — VIDEO OUTPUT BOARD

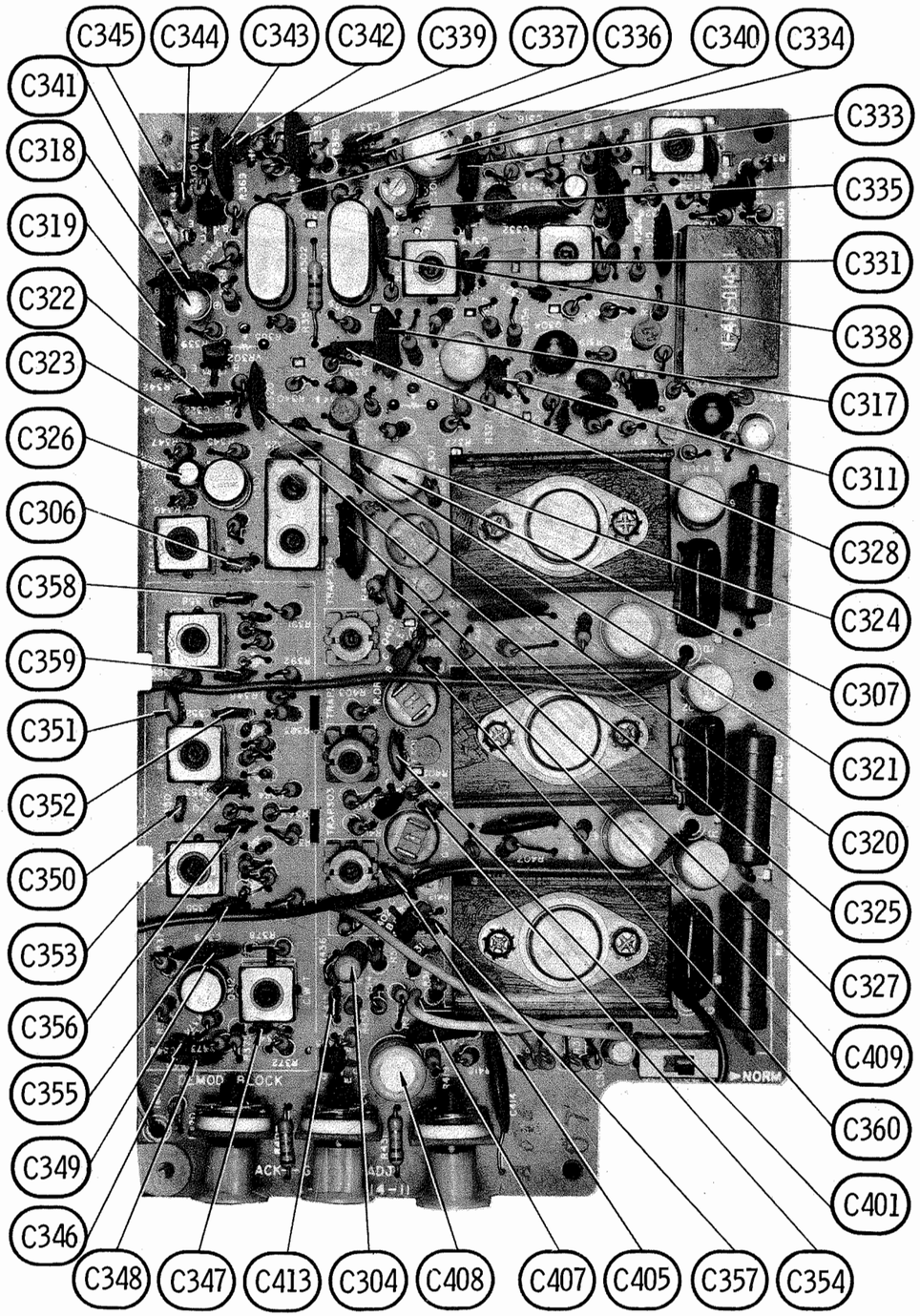
CHASSIS — FRONT VIEW



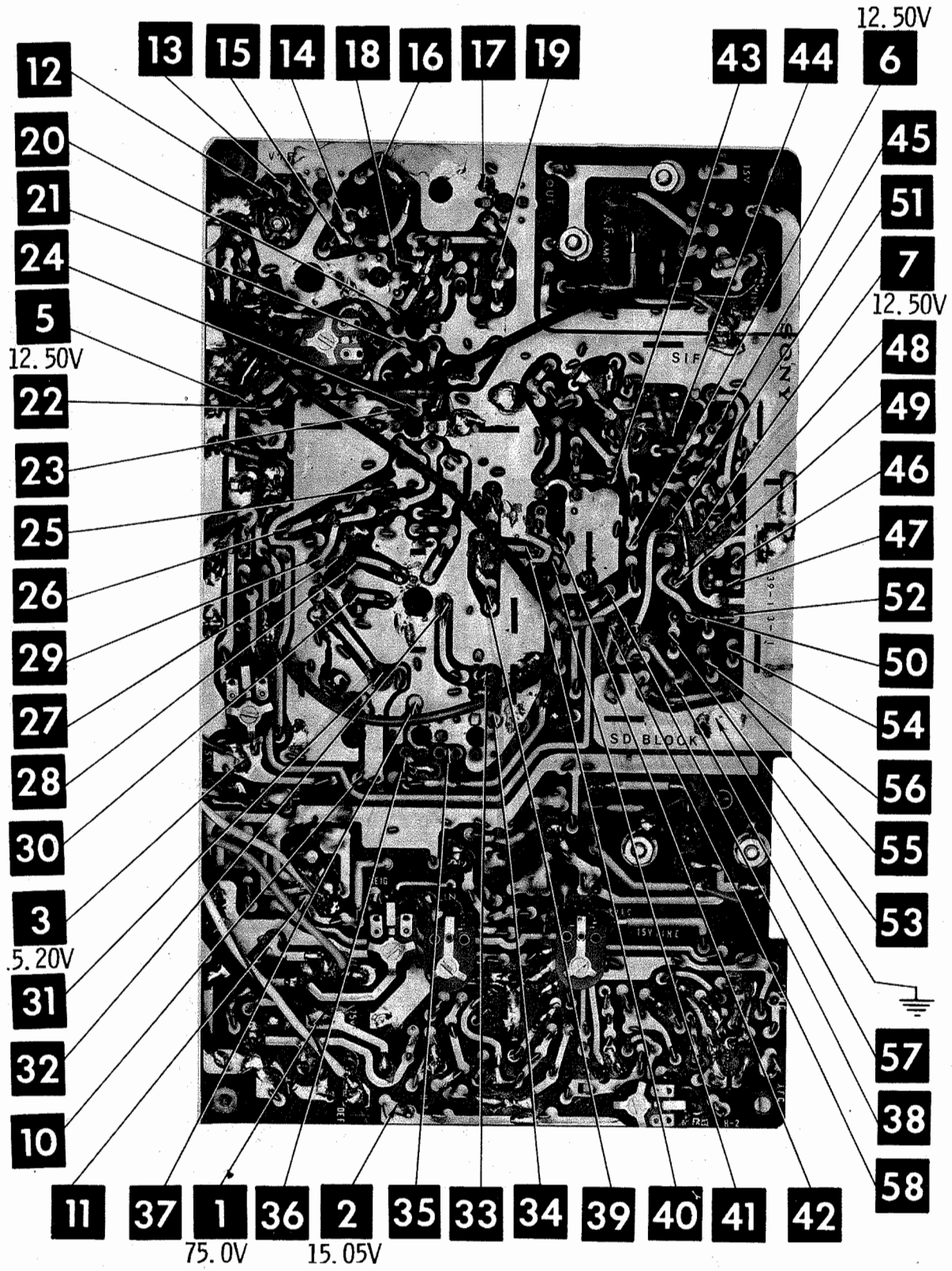
SIGNAL — DEFLECTION BOARD



CHROMA — VIDEO OUTPUT BOARD

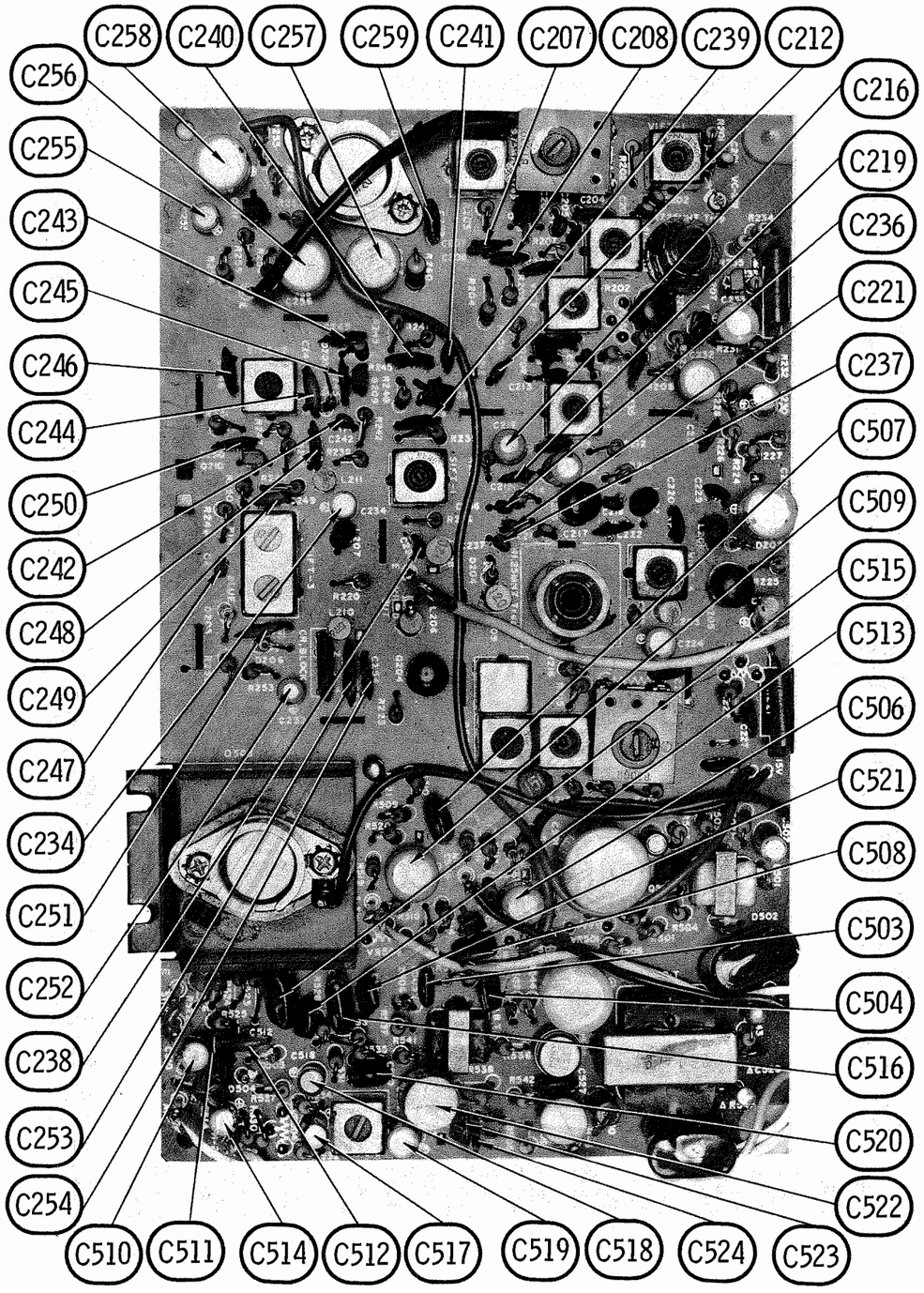


CHROMA — VIDEO OUTPUT BOARD

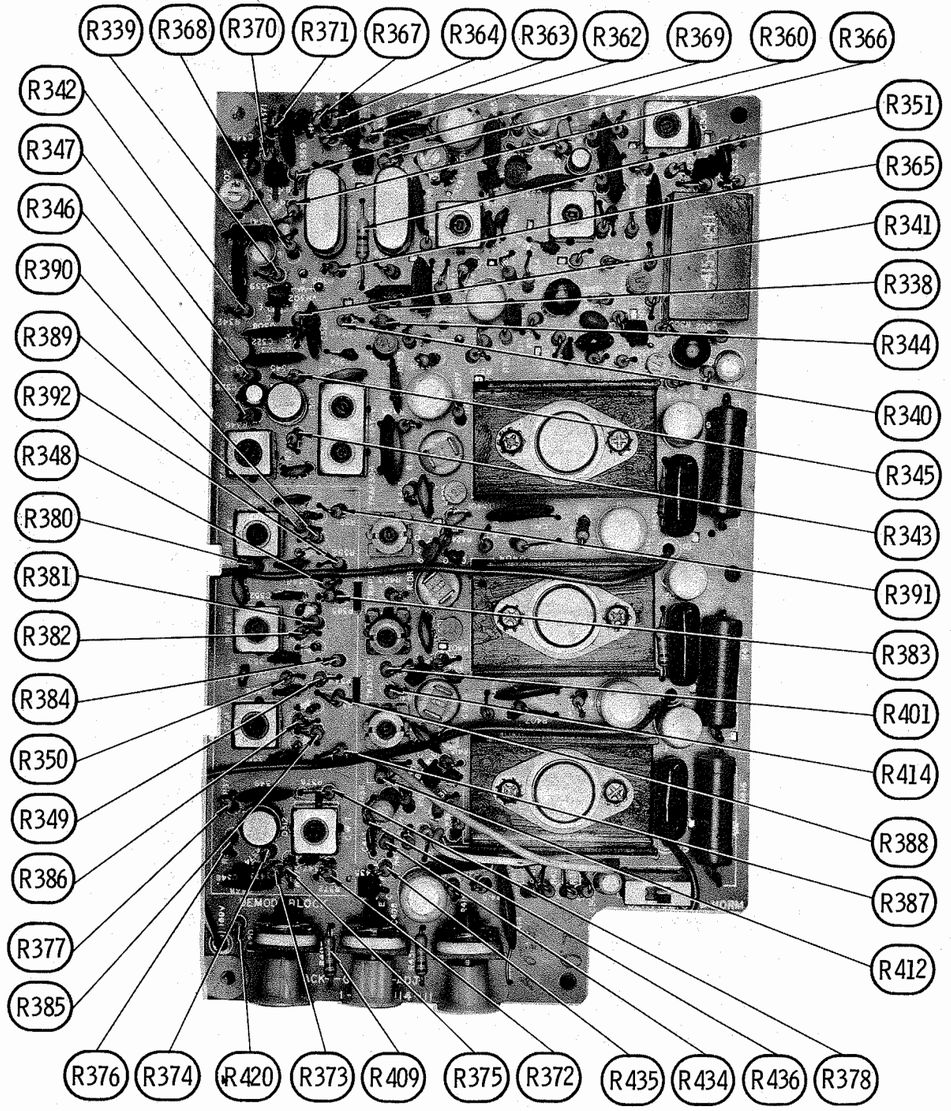


SIGNAL — DEFLECTION BOARD

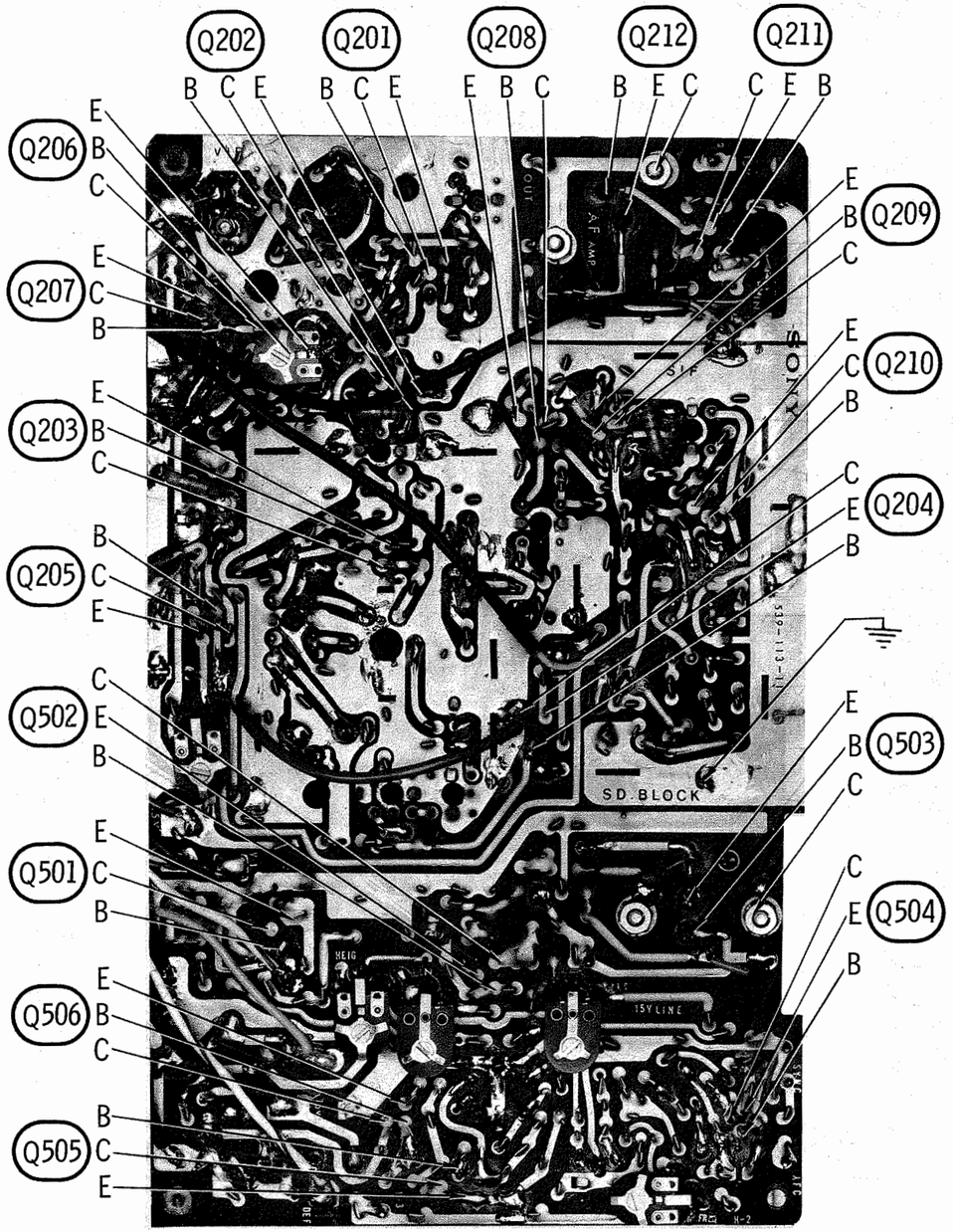
Howard W. Sams CIRCUITRACE Photo



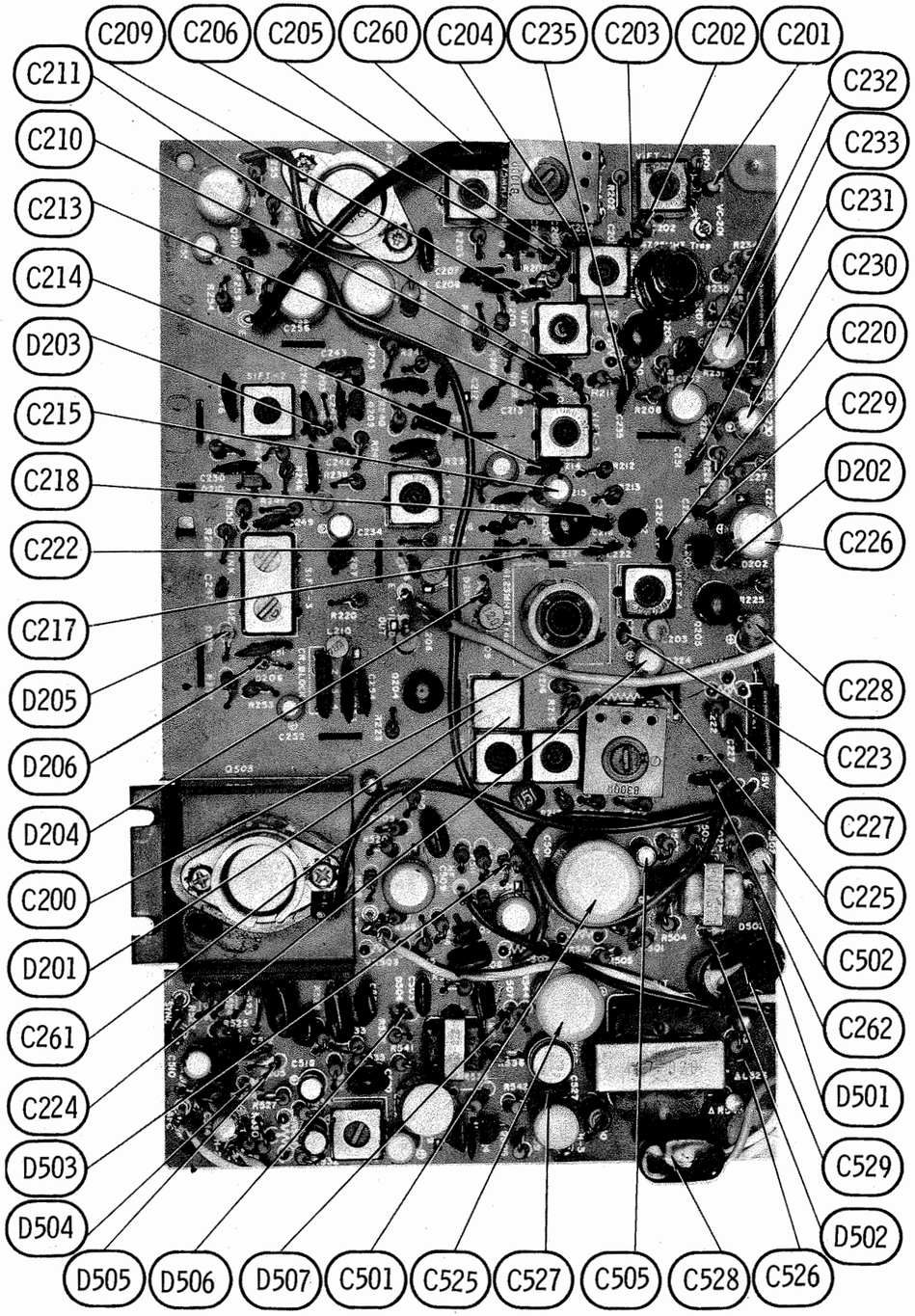
SIGNAL — DEFLECTION BOARD



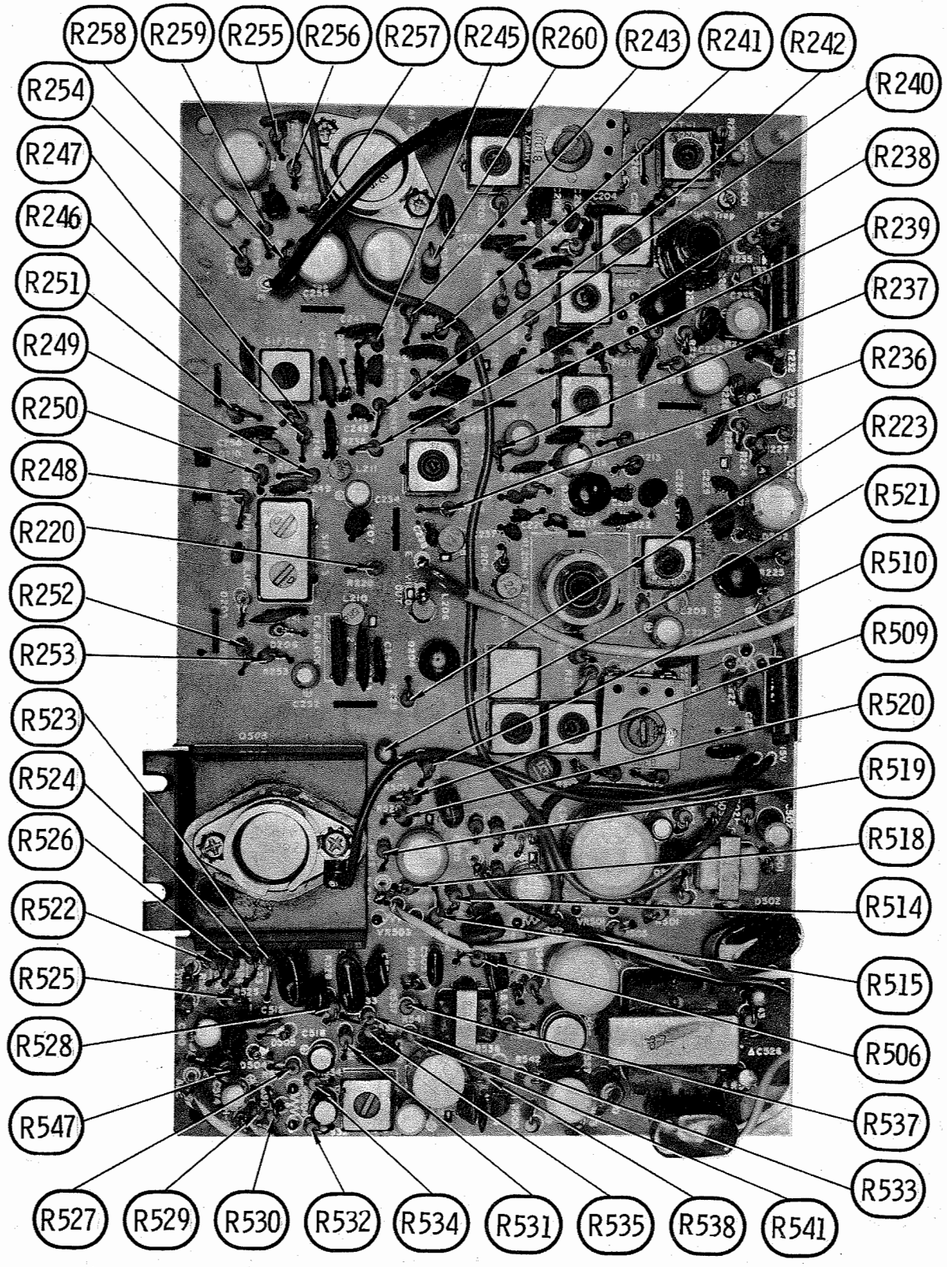
CHROMA — VIDEO OUTPUT



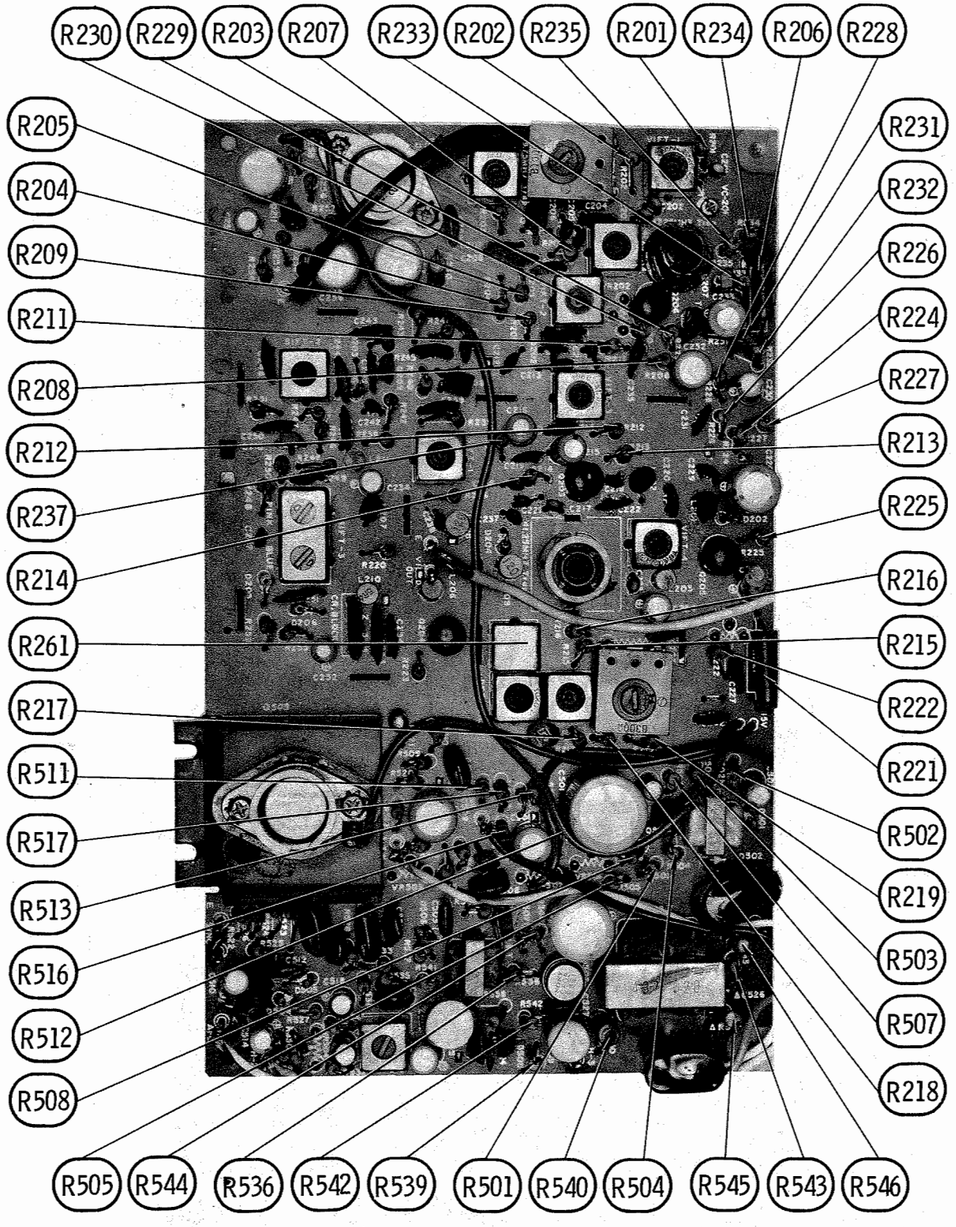
SIGNAL — DEFLECTION BOARD



SIGNAL — DEFLECTION BOARD



SIGNAL — DEFLECTION BOARD



SIGNAL — DEFLECTION BOARD

PARTS LIST AND DESCRIPTION (CONTINUED)

(When ordering parts, state Model, Part Number, and Description.)

Replacement parts shown may be superseded by the availability of newly introduced replacements. Have your local distributor check Sams COUNTER FACTS* for the most up-to-date replacement.

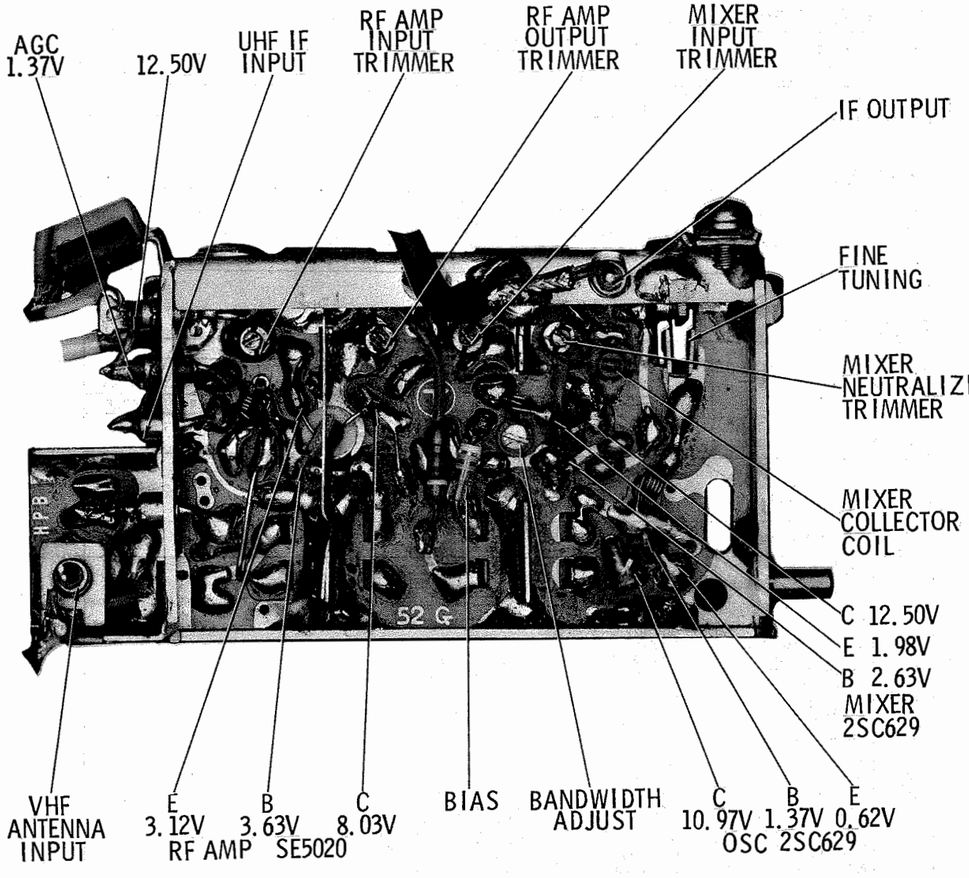
CABINETS & CABINET PARTS (When ordering specify model, chassis & color)

ITEM	PART No.
Top Cover Assembly	X-43020-01
Front Panel Assembly	X-43020-04
Handle Assembly	X-43020-02
Mask Assembly	X-43020-03
Shield Case Assembly	X-43025-04
Foot Assembly	X-43020-16

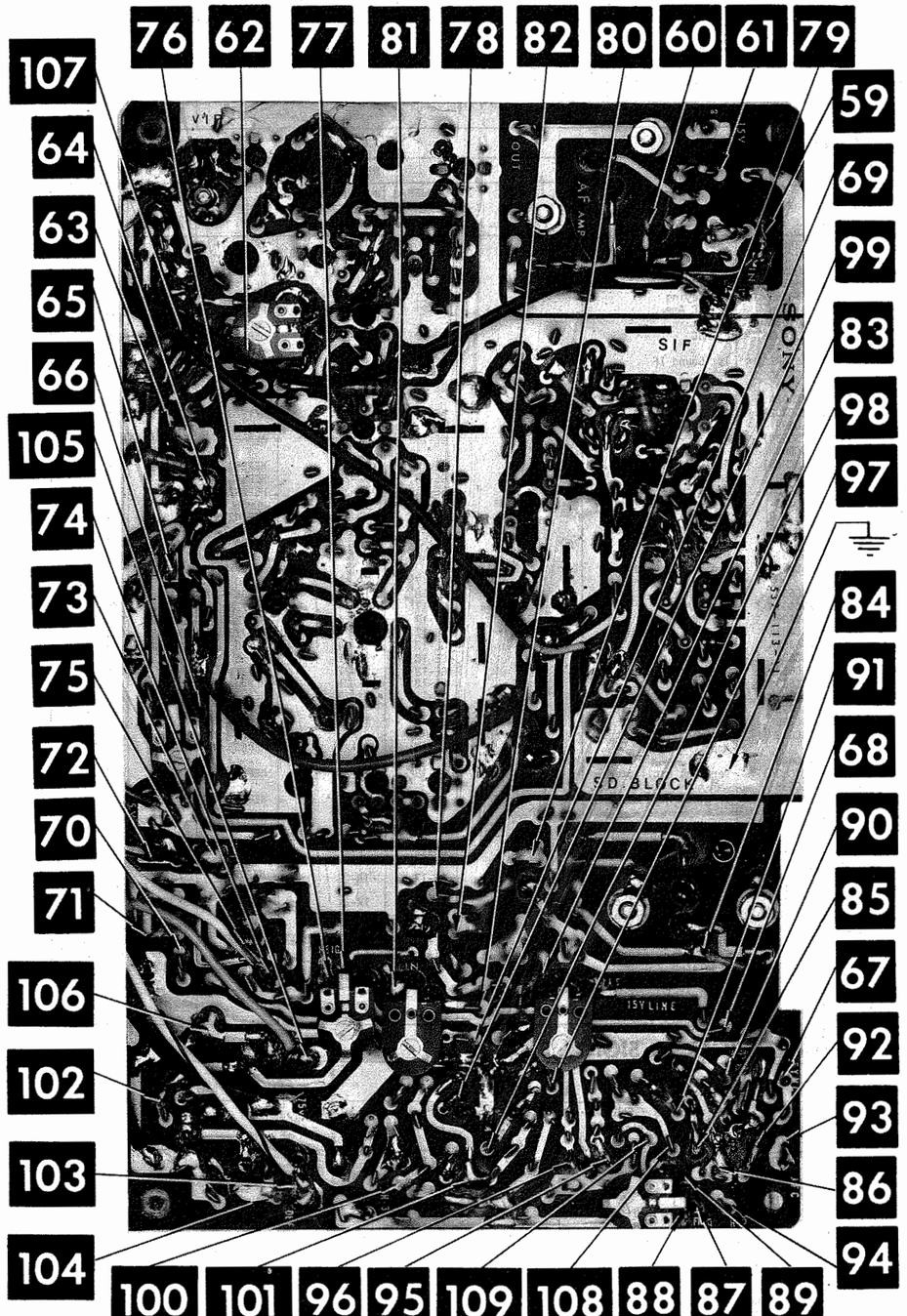
ITEM	PART No.
Knob - VHF Channel Selector	X-43020-05
Knob - VHF Fine Tuning	X-43020-06
Knob - UHF Channel Selector	X-43020-07
Knob - Contrast, Horiz. Hold,Vert.Hold	X-43020-09
Knob - Hue,Brightness,Volume,Color	X-43020-10
Indicator Ass'y.UHF Channel Selector	X-43020-08

WIRING DATA

High Voltage Lead	Use BELDEN No.	8868 (25KV)
Shielded Hook-up Wire	Use BELDEN No.	8885 (Single Conductor)
		8738 (Two Conductor)
General-use Unshielded Hook-up Wire	Use BELDEN No.	8530 (Solid) Available in 12 Colors
		8524 (Stranded) Available in 12 Colors
Power Cord (Interlock Type)	Use BELDEN No.	8874 (Rubber) or 8895 (Plastic)
300-Ohm Tuner Input Lead	Use BELDEN No.	8225
300-Ohm Antenna Lead-in	Use BELDEN No.	8275 (Foam Core) or 8285 (Foam Jacketed)
Antenna Rotor Cable	Use BELDEN No.	8464 (Flat) or 8484 (Round) - 4 Conductor
		8485 (Round) - 5 Conductor
		8488 (Round) - 8 Conductor



VHF TUNER



SIGNAL — DEFLECTION BOARD Howard W. Sams CIRCUITRACE Photo

PARTS LIST AND DESCRIPTION

(When ordering parts, state Model, Part Number, and Description.)

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PICTURE TUBE

ITEM No.	REPLACEMENT DATA				NOTES
	MFGR. PART No.	GENERAL ELECTRIC PART No.	RCA PART No.	SYLVANIA PART No.	
V101	SD-30				

TRANSISTORS

ITEM No.	TYPE No.	FUNCTION	REPLACEMENT DATA					
			MFGR. PART No.	GENERAL ELECTRIC PART No.	INTERNATIONAL RECTIFIER PART No.	MOTOROLA PART No.	RCA PART No.	SYLVANIA PART No.
Q201	2SC657	1st Video IF						
Q202	2SC657	2nd Video IF						
Q203	SE5025	3rd Video IF				HEP720		
Q204	CS1256H	1st Video Amp		GE-21	TR-30	HEP242		ECG 129
Q205	CS1256H	AGC Keying		GE-21	TR-30	HEP242		ECG 129
Q206	CS1256H	RF AGC Amp		GE-21	TR-30	HEP242		ECG 129
Q207	2CS403A (2SC402A) *	RF AGC		GE-17	TR-22	HEP723	SK3018	ECG 128
Q208	2SC403A (2SC402A) *	1st Sound IF		GE-17	TR-22	HEP723	SK3018	ECG 128
Q209	2SC403A (2SC402A) *	2nd Sound IF		GE-17	TR-22	HEP723	SK3018	ECG 128
Q210	2SC403A (2SC402A) *	3rd Sound IF		GE-17	TR-22	HEP723	SK3018	ECG 128
Q211	2SC633 (2SC634) *	AF Amp		GE-18	TR-21	HEP56	SK3020	ECG 123
Q212	2SC867 (2SC895) *	Audio Output		GE-12	TR-23	HEP240	SK3021	ECG 124
Q301	2SC633	2nd Video Amp		GE-18	TR-21	HEP56		ECG 123
Q302	CS1256H	3rd Video Amp		GE-21	TR-30	HEP242		ECG 129
Q303	2SC633	Video Output		GE-18	TR-21	HEP56	SK3040	ECG 123
Q304	CS1256H	Sync Amp		GE-21	TR-30	HEP242	SK3025	ECG 129
Q305	2SC318A	1st Chroma Bandpass Amp		GE-17	TR-24	HEP50	SK3018	ECG 108
Q306	2SC633	A.C.C.		GE-18	TR-21	HEP56	SK3020	ECG 123
Q307	2SC352A	2nd Chroma Bandpass Amp		GE-17	TR-24	HEP50	SK3018	ECG 108
Q308	2SC633	Color Killer		GE-18	TR-21	HEP56	SK3020	ECG 123
Q309	2SC403A	Burst Amp		GE-17	TR-24	HEP723	SK3018	ECG 128
Q310	2SC403A	3.58mc Control		GE-17	TR-24	HEP723	SK3018	ECG 128
Q311	2SC403A	3.58mc Oscillator		GE-17	TR-24	HEP723	SK3018	ECG 128
Q312	2SC352A	3.58mc Buffer		GE-17	TR-24	HEP50	SK3018	ECG 108
Q401	2SC633	Red Video Amp		GE-18	TR-21	HEP56		ECG 123
Q402	2SC633	Green Video Amp		GE-18	TR-21	HEP56		ECG 123
Q403	2SC633	Blue Video Amp		GE-18	TR-21	HEP56		ECG 123
Q404	2SC795	Red Video Output		GE-12	TR-23	HEP240		ECG 124
Q405	2SC795	Green Video Output		GE-12	TR-23	HEP240		ECG 124
Q406	2SC795	Blue Video Output		GE-12	TR-23	HEP240		ECG 124
Q407	2SC633	Horizontal Blanking Amp		GE-18	TR-21	HEP56	SK3020	ECG 123
Q501	2SC633 (2SC634) *	Vertical Oscillator		GE-18	TR-21	HEP56	SK3020	ECG 123
Q502	2SC633 (2SC634) *	Vertical Amp		GE-18	TR-21	HEP56	SK3020	ECG 123
Q503	2SC867 (2SC895) *	Vertical Output		GE-12	TR-23	HEP240		ECG 124
Q504	2SC633 (2SC634) *	Sync Sep-Phase Inv.		GE-18	TR-21	HEP56	SK3020	ECG 123
Q505	2SC403A (2SC402A)*	Horizontal Oscillator		GE-17	TR-22	HEP723	SK3020	ECG 128
Q506	2SC805	Horizontal Driver				HEP713		ECG 154
Q601	2SC633	1st Pincushion Amp		GE-18	TR-21	HEP56	SK3020	ECG 123
Q602	2SC633	2nd Pincushion Amp		GE-18	TR-21	HEP56	SK3020	ECG 123
Q603	2SC633	3rd Pincushion Amp		GE-18	TR-21	HEP56	SK3020	ECG 123
Q604	2SC756	Pincushion Output		GE-18	TR-25	HEP243	SK3020	ECG 128
Q605	2SC867	Error Amp		GE-12	TR-23	HEP240	SK3021	ECG 124
Q606	2SC807	Regulator		GE-19	TR-26	HEP247	SK3036	ECG 130
Q801	2SC806	High Voltage Driver				HEP707		
Q901	2SC806	Horizontal Deflection Output				HEP707		

* Alternate

POWER RECTIFIERS & SIGNAL DIODES

ITEM No.	MFGR. PART OR TYPE No.	REPLACEMENT RECTIFIERS & DIODES			REPLACEMENT RECTIFIERS	NOTES
		GENERAL ELECTRIC PART No.	INTERNATIONAL RECTIFIER PART No.	SYLVANIA PART No.	RCA PART No.	
D101	Z81-11		1ZM11-T10	ECG 141		Zener
D201	1T261	1N60	1N60	ECG 109		
D202	1S1555					
D203	1S1555					
D204	1T261	1N60	1N60	ECG 109		
D205	1T23(S)	1N60	1N60	ECG 110 (4)		(4) Matched pair.
D206	1T23(S)	1N60	1N60	ECG 110 (4)		
D301	1S1555					
D302	1S1555					
D303	1S1555					
D304	1S1555					
D305	1S1555					
D306	1S1555					
D307	1S1555					
D501	1S1555					
D502	1S1555					
D503	1S1555					
D504	1S1555					
D505	1S1555					
D506	1S1555					

PARTS LIST AND DESCRIPTION (CONTINUED)

(When ordering parts, state Model, Part Number, and Description.)

Replacement parts shown may be superseded by the availability of newly introduced replacements.
Have your local distributor check Sams COUNTER FACTS® for the most up-to-date replacement.

TRANSFORMERS (Sweep Circuits)

ITEM No.	USE	REPLACEMENT DATA					NOTES
		MFGR. PART No.	MERIT PART No.	STANCOR PART No.	THORDARSON PART No.	TRIAD PART No.	
A24	Yoke (Horiz. 1.5mh) 90° (Vert. 55mh)	1-451-052 (1-451-052-11)					
BAC	Beam Alignment coil (Neck Twist coil)	1-425-529					
FBT	Flyback	1-900-806 (TDK-Q53164)					
HBT	Horiz. Blocking Osc.	1-435-028 (435-028)					
HCT	Horiz. Convergence	1-439-055 (1-439-055-11)					
HDT	Horiz. Driver	1-437-020 (437-020)					
HOT	Horiz. Output	1-439-056 (1-439-056-11)					
VBT	Vert. Blocking Osc.	1-435-008 (435-008)					
VOT	Vertical Output	1-429-230 (422-230-12)					

TRANSFORMER (Audio Output)

ITEM No.	IMPEDANCE		REPLACEMENT DATA					NOTES
	PRI.	SEC.	MFGR. PART No.	MERIT PART No.	STANCOR PART No.	THORDARSON PART No.	TRIAD PART No.	
SOT	3200	8	1-427-229					

SPEAKER

ITEM No.	TYPE	REPLACEMENT DATA		NOTES
		MFGR. PART No.	QUAM PART No.	
SP1	2" x 4" PM 8 ohms	1-502-193		

FUSE DEVICES

ITEM No.	DESCRIPTION	REPLACEMENT DATA						
		PART No.		BUSS PART No.		LITTELFUSE PART No.		WORKMAN PART No.
		DEVICE	HOLDER	DEVICE	HOLDER	DEVICE	HOLDER	DEVICE
F901	5A, Quick-Acting, Pigtail	1-532-214		GJV 5		318005		
F902	2A, Quick-Acting, Pigtail	1-532-210		GJV 2		318002		

MISCELLANEOUS

ITEM No.	PART NAME	PART No.	NOTES
	VHF Antenna	1-501-091-12S	
	UHF Antenna	X-43020-12	
	VHF Tuner	98-0147-10 (BT-341Wu)	
	UHF Tuner	1-463-006 (BT-182)	
CR	Ratio Detector Network	1-101-536	
C101	Antenna Isolation	1-102-071	470pf, Spark Gap
C102	Antenna Isolation	1-102-071	470pf, Spark Gap
C103	Antenna Isolation	1-102-072	130pf, Spark Gap
C908	Cabinet Isolation	1-102-071	470pf, Spark Gap
C909	Cabinet Isolation	1-102-071	470pf, Spark Gap
DL-1	Delay Line	1-415-014	
R802	Voltage Divider Network	1-202-712	150meg, Total
SW301	Switch	1-514-445	Service-Normal
SW901	Switch	1-514-446	On-Off
X301	Crystal	1-527-154	3.58MC Control
X302	Crystal	1-527-154	3.58MC Oscillator
	Printed Circuit Board	98-0147-20	Signal-Deflection (Complete)
	Printed Circuit Board	1-539-113-12	Signal-Deflection (Board only)
	Printed Circuit Board	98-0147-30	Chroma-Video (Complete)
	Printed Circuit Board	1-539-114-11	Chroma-Video (Board only)
	Printed Circuit Board	98-0147-40	Power Supply (Complete)
	Printed Circuit Board	1-539-115-12	Power Supply (Board only)
	Printed Circuit Board	98-0147-60	CRT Socket (Complete)
	Printed Circuit Board	1-539-117	CRT Socket (Board only)
	Printed Circuit Board	98-0147-50	Voltage Regulator (Complete)
	Printed Circuit Board	1-539-116-11	Voltage Regulator (Board only)

PARTS LIST AND DESCRIPTION (CONTINUED)

(When ordering parts, state Model, Part Number, and Description.)

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RESISTORS (Power and Special)

ITEM No.	RATING	REPLACEMENT DATA		
		IRC PART No.	WORKMAN PART No.	MFGR. PART No.
PR-901	Posistor			1-800-056
R405	8200 ohm 3W		3G-8.2K	1-206-048
R416	8200 ohm 3W		3G-8.2K	1-206-048
R427	8200 ohm 3W		3G-8.2K	1-206-048
R620	2 ohm 2W Fusible			1-207-239
R701	2 ohm 2W Fusible			1-207-238
R705	2 ohm 2W Fusible			1-207-238

ITEM No.	RATING	REPLACEMENT DATA		
		IRC PART No.	WORKMAN PART No.	MFGR. PART No.
R715	5 ohm 2W Fusible			1-207-241
R717	.5 ohm 2W	PW5-.5Ω	WM5Ω	1-207-151
R901	1500 ohm 3W		3G-1.5K	1-206-159
TH201	Thermistor			1-800-058
TH401	Thermistor			
TH501	Thermistor			1-800-057
VDR6	VDR *			1-800-031
VDR9	VDR *			1-800-030

* Voltage Dependent Resistor.

COILS (RF-IF)

ITEM No.	USE	REPLACEMENT DATA			
		PART No.	MEISSNER PART No.	MILLER PART No.	WORKMAN PART No.
BAT	Burst Amp.	1-405-372			
BPT1	1st Chroma Bandpass	1-425-505			
BPT2	2nd Chroma Bandpass	1-425-506			
CWT	Continuous Wave	1-405-371			
RD DEM	Red Demodulator	1-425-507			
GD DEM	Green Demodulator	1-425-508			
BD DEM	Blue Demodulator	1-425-509			
FMT	FM Trap	1-409-175			
L101	Peaking 220uh	1-407-173		72F224AP	
L201	RF Choke 3.3uh	1-407-184	19-1003	74F336AP	T816
L202	RF Choke 3.3uh	1-407-184	19-1003	74F336AP	T816
L203	RF Choke 3.3uh	1-407-184	19-1003	74F336AP	T816
L204	Video Detector 7uh	1-425-504			
L205	Peaking 150uh	1-407-171	19-2026	72F154AP	T868
L206	RF Choke 1uh	1-407-178	19-1001	74F106AP	T805
L207	RF Choke 3.3uh	1-407-184	19-1003	74F336AP	T816
L208	RF Choke .12uh	1-407-158		72F125AP	
L209	RF Choke 12uh	1-407-158		72F125AP	
L210	RF Choke 5.6uh	1-407-187	19-1008	74F566AP	T820
L211	RF Choke 3.3uh	1-407-184	19-1003	74F336AP	T816
L301	Peaking 470uh	1-407-177	19-3500	72F474AP	T323
L302	Peaking 470uh	1-407-177	19-3500	72F474AP	T323
L303	Peaking 5.6	1-407-203		4669	T881
L304	RF Choke 18uh	1-407-160		72F185AP	
L305	Peaking 6Buh	1-407-167	19-7068	72F685AP	
L306	Peaking 82uh	1-407-168	19-2023	72F825AP	TA813
L401	RF Choke 12uh	1-407-158		72F125AP	
L402	Peaking 820uh	1-407-194		72F824AP	
L403	RF Choke 12uh	1-407-158		72F125AP	
L404	Peaking 820uh	1-407-194		72F824AP	
L405	RF Choke 12uh	1-407-158		72F125AP	
L406	Peaking 820uh	1-407-194		72F824AP	
L501	Peaking 1mh	1-407-195	19-2033	4662	T874
L701	Peaking 5.6mh	1-407-203		4669	T881
L702	Peaking 2.2mh	1-407-398		4666	T876
L801	Peaking 200uh	1-407-346	19-4201	6154	T312
L802	Peaking 200uh	1-407-346	19-4201	6154	T312
L903	Line Choke (A & B) 50uh	1-421-196			
L904	Peaking 56uh	1-407-166			
ST1	1st Sound IF	1-403-350			
ST2	2nd Sound IF	1-403-316			
ST3	Ratio Detector	1-403-313			
TOT	Chroma Take-off	1-425-510			
T201	47.25MC Trap	1-409-145			
T202	39.75MC Trap	1-409-147			
T203	41.25MC Trap	1-409-148			
T204	41.25MC Trap	1-409-174			
T205	4.5MC Trap	1-409-146			
T301	3.58MC Trap	1-409-167			
T302	3.58MC Trap	1-409-168			
T303	3.58MC Trap	1-409-168			
T304	3.58MC Trap	1-409-168			
VT1	1st Video IF	1-403-504			
VT2	2nd Video IF	1-403-486			
VT3	3rd Video IF	1-403-486			
VT4	4th Video IF	1-403-524			

COILS (Sweep Circuits)

ITEM No.	FUNCTION	REPLACEMENT DATA						
		MFGR. PART No.	MERIT PART No.	MILLER PART No.	STANCOR PART No.	THORDARSON MEISSNER PART No.	TRIAD PART No.	WORKMAN PART No.
HSC	Horiz. Stabilizer	1-413-005 (413-005-12)						

TRANSFORMER (Power)

ITEM No.	RATING		REPLACEMENT DATA					NOTES
	PRI.	SEC. 1	MFGR. PART No.	MERIT PART No.	STANCOR PART No.	THORDARSON PART No.	TRIAD PART No.	
PT	117VAC @ .56A AC, Tap @ 65VAC @ .440A AC	6.3VAC @ .480A AC	1-441-474					

PARTS LIST AND DESCRIPTION (CONTINUED)

(When ordering parts, state Model, Part Number, and Description.)

Replacement parts shown may be superseded by the availability of newly introduced replacements.
Have your local distributor check Sams COUNTER FACTS* for the most up-to-date replacement.

POWER RECTIFIERS & SIGNAL DIODES (cont)

ITEM No.	MFGR. PART OR TYPE No.	REPLACEMENT RECTIFIERS & DIODES			REPLACEMENT RECTIFIERS	NOTES
		GENERAL ELECTRIC PART No.	INTERNATIONAL RECTIFIER PART No.	SYLVANIA PART No.	RCA PART No.	
D507	1S1555					
D601	1N3021 (1)		1ZM11-T10	ECG 141		Zener
D602	S7-8					(1) 1S336 may be used in some versions.
D701	HF-SD-1Z	GE-504A	8D4 or 5A4-D	ECG 116 or ECG 117	SK3030 or SK3031	
D702	SB-2	GE-504A	8D4 or 5A4-D	ECG 116 or ECG 117	SK3030 or SK3031	
D703	HF-SD-1C	GE-504A	8D4 or 5A4-D	ECG 116 or ECG 117	SK3030 or SK3031	
D704	SB-2	GE-504A	8D4 or 5A4-D	ECG 116 or ECG 117	SK3030 or SK3031	
D705	COR-4	GE-504A(7)	18DC2A or 8D4 (7)	ECG 116(7) or ECG 117 (7)	SK3030 (7) or SK3031(7)	
D706	CO-4	GE-504A(7)	18DJ2A or 8D4 (7)	ECG 116 (7) or ECG 117 (7)	SK3030 (7) or SK3031 (7)	(7) Two required.
D801	S-2					
D802	SB-2B	GE-504A	8D4 or 5A4-D	ECG 116 or ECG 117		

ELECTROLYTIC CAPACITORS

ITEM No.	RATING*	REPLACEMENT DATA						
		PART No.	AEROVOX PART No.	CENTRALAB PART No.	CORNELL-DUBILIER PART No.	GENERAL ELECTRIC PART No.	MALLORY PART No.	SPRAGUE PART No.
C104	10 16V	1-121-347	BCD25010	EP30-10	PC10-50	MT1-5	MTV10CB50	TE-1155
C215	33 6.3V	1-121-284	BC012035	EP6-50	PC30-35	MT1-13	MTV30CB25	TE-1132.1
C216	33 6.3V	1-121-284	BC012035	EP6-50	PC30-35	MT1-13	MTV30CB25	TE-1132.1
C224	33 6.3V	1-121-284	BC012035	EP6-50	PC30-35	MT1-13	MTV30CB25	TE-1132.1
C226	100 16V	1-121-356	BC015100	EA30-100	PC100-16	MT1-20	MTV100CK25	TE-1162
C228	10 16V	1-121-347	BCD25010	EP30-10	PC10-50	MT1-5	MTV10CB50	TE-1155
C230	1 25V		BC050001	EP30-2	PC1-100	MT1-1	MTV1CB50	TE-1200
	1 50V	1-121-391						
C232	33 16V	1-121-350	BC025035	EP30-25	PC30-35	MT1-16.5	MTV30CB25	TE-1159
C233	33 16V	1-121-350	BCD25035	EP30-25	PC30-35	MT1-16.5	MTV30CB25	TE-1159
C234	10 16V	1-121-347	BC025010	EP30-10	PC10-50	MT1-5	MTV10CB50	TE-1155
C252	10 16V	1-121-347	BCD25010	EP30-10	PC10-50	MT1-5	MTV10CB50	TE-1155
C255	10 16V	1-121-347	BC025010	EP30-10	PC10-50	MT1-5	MTV10CB50	TE-1155
C256	100 16V	1-121-356	BC015100	EA30-100	PC100-16	MT1-20	MTV100CK25	TE-1162
C257	100 16V	1-121-356	BC015100	EA30-100	PC100-16	MT1-20	MTV100CK25	TE-1162
C25B	100 16V	1-121-356	BCD15100	EA30-100	PC100-16	MT1-20	MTV100CK25	TE-1162
C302	10 25V	1-121-283	BCD25010	EP30-10	PC10-50	MT1-5	MTV10CB50	TE-1204
C304	2.2 NP 25V	1-121-705	PRS-NP-7300		BRNP2-50	NPQT-1	TCN502	TVAN1202
C305	10 16V	1-121-347	BC025010	EP30-10	PC10-50	MT1-5	MTV10CB50	TE-1155
C307	47 25V	1-121-289	BC025050	EP30-50	PC50-25	MT1-16.5	MTV50CD25	TE-1209
C309	.2 25V	1-127-081			TYR13BF224K		TAS224K015P0A	196D224X0035 DB
C316	10 16V	1-121-347	BCD25010	EP30-10	PC10-50	MT1-5	MTV10CB50	TE-1155
C318	4.7 25V	1-121-281	BC025005	EP30-5	PC5-100	MT1-3	MTV50CB50	TE-1202
C326	3.3 25V	1-121-344	BCD50003	EP30-2	PC2-100	MT1-3	MTV3CB50	TE-1201.1
C334	47 16V	1-121-353	BCD25050	EP30-50	PC50-16	MT1-16.5	MTV50CD25	TE-1160
C404	220 6.3V		BCD20200	EA6-250	PC250-10	MT1-25	MTV250CK6	TE-1104
C408	220 6.3V		BCD20200	EA6-250	PC250-10	MT1-25	MTV250CK6	TE-1104
C412	220 6.3V		BCD20200	EA6-250	PC250-10	MT1-25	MTV250CK6	TE-1104
C501	470 16V	1-121-727	BCD15500	EA15-500	PC500-16	QT1-30A	MTV500DN15	TL-1166
C502	10 16V	1-121-347	BCD25010	EP30-10	PC10-50	MT1-5	MTV10CB50	TE-1155
C505	10 16V	1-131-116	BCD25010	EP30-10	PC10-50	MT1-5	MTV10CB50	TE-1155
C506	33 16V	1-121-350	BCD25035	EP30-25	PC30-35	MT1-16.5	MTV30CB25	TE-1159
C509	47 16V	1-121-353	BC025050	EP30-50	PC50-16	MT1-16.5	MTV50CD25	TE-1160
C510	1 25V		BCD50001	EP50-2	NLW1-50	MT1-1	MTV1CB50	TE-1200
	1 16V	1-121-391						
C514	1 25V		BCD50001	EP50-2	PC1-100	MT1-1	MTV1CB50	TE-1200
	1 16V	1-121-391						
C517	2.2 35V	1-121-449	BCD50002	EP50-2	PC2-100	MT1-1	MTV2CB50	TE-1301
C518	2.2 35V	1-121-449	BCD50002	EP50-2	PC2-100	MT1-1	MTV2CB50	TE-1301
C519	10 25V	1-121-283	BCD25010	EP30-10	PC10-50	MT1-5	MTV10CB50	TE-1204
C525	10 100V	1-121-126	CRE907A		AL10-150	MT1-8	TC1D100	TE-1407
C601	1 150V	1-121-189	CRE950A		WBR1-500	MT1-2	TT150X1	TE-1500
C602	1 150V	1-121-189	CRE950A		WBR1-500	MT1-2	TT150X1	TE-1500
C603	33 25V	1-121-286	BCD25035	EP30-25	PC30-25	MT1-13.5	MTV30CB25	TE-1207.5
C605	1 50V	1-121-391	BCD50001	EP50-2	PC1-100	MT1-1	MTV1CB50	TE-1300
C606	47 25V	1-121-289	BCD25050	EP30-50	PC50-25	MT1-16.5	MTV50CD25	TE-1209
C607	3 150V		CRE952A		WBR3-500	MT1-4	TT150X3	TE-1502
	3.3 150V	1-121-707						
C608A	470 100V	1-125-061	AFH3-04 '8'				FP318.85A & TC499A	
B	330 100V		PRS1510					
C	220 100V							
C611	10 25V	1-121-283	BCD25010	EP30-10	PC10-50	MT1-5	MTV10CB50	TE-1204
C701	220 16V	1-121-421	BCD20200	EA15-250	PC200-16	QT1-30A	MTV200CK15	TE-1164
C704	470 10V	1-121-425	BCD15500	EA15-500	PC500-16	QT1-32	MTV500DN15	TL-1141
C705	220 25V	1-121-422	BCD20200	EA30-250	PC250-25	MT1-23.5	MTV200DJ25	TE-1213
C708	1 350V	1-121-168	PRS1700		WBR1-500	QT1-1	TC595	TVA-1700
C709	4.7 350V	1-121-706	PRS1600		WBR5-500	QT1-3.5	TC60A	TVA-1602.5
C805	80 100V	1-119-236	PRS1500-PRS1700		WBR80-450	QT1-20	TC492A	TVA-1418
C806	1 350V	1-119-060			WBR1-500	QT1-1	TC595	TVA-1700

CAPACITORS

ITEM No.	RATING	REMARKS	REPLACEMENT DATA					
			AEROVOX PART No.	CENTRALAB PART No.	CORNELL-DUBILIER PART No.	ELMENCO PART No.	MALLORY PART No.	SPRAGUE PART No.
C105	.1 100V 10%		DBE2P1		DPMS2P1	1DP-2-104	PVC101	225P10491WD3
C200	82 NPO 5%			DTZ-B2			CN0482	10TCC-Q82
C201	3 N220							10TCR-V30
C202	5 N220 +.5							10TCR-V50
C203	5 N220 +.5							10TCR-V50

PARTS LIST AND DESCRIPTION (CONTINUED)

(When ordering parts, state Model, Part Number, and Description.)

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CAPACITORS (cont)

ITEM No.	RATING	REMARKS	REPLACEMENT DATA					
			AEROVOX PART No.	CENTRALAB PART No.	CORNELL-DUBILIER PART No.	ELMENCO PART No.	MALLORY PART No.	SPRAGUE PART No.
C204	.002		GPD X5F202K	DM-202	GP2000	CCD-202	GP220	2SS-D20
C205	8 NPO ±.5		NPO-DI 8.2		NP08P2			10TCC-V82
C206	3		NPO-DI 3.0					10TCC-V30
C207	.002		GPD X5F202K	DM-202	GP2000	CCD-202	GP220	2SS-D20
C208	.002		GPD X5F202K	DM-202	GP2000	CCD-202	GP220	2SS-D20
C209	.002		GPD X5F202K	DM-202	GP2000	CCD-202	GP220	2SS-D20
C210	3		NPO-DI 3.0					10TCC-V30
C211	.002		GPD X5F202K	DM-202	GP2000	CCD-202	GP220	2SS-D20
C212	.002		GPD X5F202K	DM-202	GP2000	CCD-202	GP220	2SS-D20
C213	.002		GPD X5F202K	DM-202	GP2000	CCD-202	GP220	2SS-D20
C214	.002		GPD X5F202K	DM-202	GP2000	CCD-202	GP220	2SS-D20
C217	7 N220 ±.5							10TCR-V68
C218	4				NP03P9			10TCC-V39
C219	.002		GPD X5F202K	DM-202	GP2000	CCD-202	GP220	2SS-D20
C220	.002		GPD X5F202K	DM-202	GP2000	CCD-202	GP220	2SS-D20
C221	.002		GPD X5F202K	DM-202	GP200D	CCD-202	GP220	2SS-D20
C222	.002		GPD X5F202K	DM-202	GP2000	CCD-202	GP220	2SS-D20
C223	6 N220 ±.5							10TCR-V56
C225	.002		GPD X5F202K	DM-202	GP2000	CCD-202	GP220	2SS-D20
C227	.002		GPD X5F202K	DM-202	GP2000	CCD-202	GP220	2SS-D20
C229	.001		GPD X5F102K	DM-102	GP1000	CCD-102	SM210	2SS-D10
C231	.002		GPD X5F202K	DM-202	GP2000	CCD-202	GP220	2SS-D20
C235	.002		GPD X5F202K	DM-202	GP2D00	CCD-202	GP220	2SS-D20
C236	10 5%			DTZ-10	CZ601CG100J		CN0410	10TCC-Q10
C237	3		NPO-DI 3.0					10TCC-V30
C238	5 ±.5		NPO-DI 5.0		CZ601CH5R0D			10TCC-V50
C239	.01		TTP-01	CK-103	MGP01	CCD-103	TA110	TG-S10
C240	.01		TTP-01	CK-103	MGP01	CCD-103	TA110	TG-S10
C241	.001		GPD X5F102K	DM-102	GP1000	CCD-102	SM210	2SS-D10
C242	3		NPO-DI 3.0					10TCC-V30
C243	.01		TTP-01	CK-103	MGP01	CCD-103	TA110	TG-S10
C244	75 N220 5%							10TCR-Q75
C245	.01		TTP-01	CK-103	MGP01	CCD-103	TA110	TG-S10
C246	.01		TTP-01	CK-103	MGP01	CCD-103	TA110	TG-S10
C247	10 5%			DTZ-10	CZ601CG10DJ		CN0410	10TCC-Q10
C248	.01		TTP-01	CK-103	MGP01	CCD-103	TA110	TG-S10
C249	33 N220 5%							10TCR-Q33
C250	.01		TTP-01	CK-103	MGP01	CCD-103	TA110	TG-S10
C251	140 N220 5%							10TCR-T15
C253	.05		TTP-05	CK-503	MGP05	CCD-503	TA150	TGL-S50
C254	.01		TTP-01	CK-103	MGPD1	CCD-103	TA110	TG-S10
C259	.01 10%		V1612S1	CPR-10000J	DPMS6S1	1DP-1-103	PVC211	225P10391WD3
C260	.005		TTP-005	CK-502	MGP005	CCD-502	TA250	TG-D50
C261	10 5%			DTZ-10	CZ601CG100J		CN0410	10TCC-Q10
C262	.002		GPD X5F202K	DM-202	GP2000	CCD-202	GP220	2SS-D20
C301	100		GPD X5F101K	DD-101	GP100	CCD-101	GP310	10TS-T10
C303	560 10%		GPD X5F561K	DD-561	GP560	CCD-561	GP356	10TS-T56
C306	39 N220							10TCR-Q39
C308	.047 10%		V1612S47		DPMS6S47	1DP-2-473	PVC1147	225P47391WD3
C310A	.001 10%		DBE6D1	CPR-10DDJ	DPMS6D1	6DP-1-102	PVC621	225P10291WD3
B	.001 10%		DBE6D1	CPR-1000J	DPMS6D1	6DP-1-102	PVC621	225P10291WD3
C311	560		GPD X5F561K	DD-561	GP560	CCD-561	GP356	10TS-T56
C312	.05		TTP-05	CK-503	MGP05	CCD-503	TA150	TGL-S50
C313	12		TCZ-12	CZ601CG120J	CCT0-120	CN0412	10TCC-Q12	
C314	.01		TTP-01	CK-103	MGP01	CCD-103	TA110	TG-S10
C315	.05		TTP-05	CK-503	MGP05	CCD-503	TA150	TGL-S50
C317	.05		TTP-05	CK-503	MGP05	CCD-503	TA150	TGL-S50
C319	.05		TTP-05	CK-503	MGP05	CCD-503	TA150	TGL-S50
C320	.05		TTP-05	CK-503	MGP05	CCD-503	TA150	TGL-S50
C321	.05		TTP-05	CK-503	MGP05	CCD-503	TA150	TGL-S50
C322	.05		TTP-05	CK-503	MGP05	CCD-503	TA150	TGL-S50
C323	.05		TTP-05	CK-503	MGP05	CCD-503	TA150	TGL-S50
C324	5		NPO-DI 5.0		NP05			10TCC-V50
C325	82 N220 5%							10TCR-Q82
C327	180 N220 5%							10TCR-T18
C328	.01		TTP-01	CK-103	MGP01	CCD-103	TA110	TG-S10
C329	39 10%		NPO-DI 39	TCZ-39		CCT0-390	CN0439	10TCC-Q39
C330	3		NPO-DI 3.0					10TCC-V30
C331	82 N750				CS601UJ820K	CCTN-820	CN7482	10TCU-Q82
C332	.05		TTP-05	CK-503	MGP05	CCD-503	TA150	TGL-S50
C333	.05		TTP-05	CK-503	MGP05	CCD-503	TA150	TGL-S50
C335	5 ±.5		NPO-DI 5.0		NP05			10TCC-V50
C336	.01		TTP-01	CK-103	MGP01	CCD-103	TA110	TG-S10
C337	82 N750				CS601UJ820K	CCTN-820	CN7482	10TCU-Q82
C338	.05		TTP-05	CK-503	MGP05	CCD-503	TA150	TGL-S50
C339	.05		TTP-05	CK-503	MGP05	CCD-503	TA150	TGL-S50
C340	10 N750		N750-DI 10	DTN-10	CZ601UJ100J	CCTN-100	CN7410	10TCU-Q10
C341	.05		TTP-05	CK-503	MGP05	CCD-503	TA150	TGL-S50
C342	33 N750		N750-DI 33	DTN-33	CZ601UJ330K	CCTN-330	CN7433	10TCU-Q33
C343	.05		TTP-05	CK-503	MGP05	CCD-503	TA150	TGL-S50
C344	10 N750		N750-DI 10	DTN-10	CZ601UJ100J	CCTN-10D	CN7410	10TCU-Q10
C345	82			DTZ-82	NP082	CCT0-820	CN0482	10TCC-Q82
C346	33 10%		NPO-DI 33	DTZ-33	NP033	CCT0-330	CN0433	10TCC-Q33
C347	6 ±.5							10TCC-V56
C348	.05		TTP-05	CK-503	MGP05	CCD-5D3	TA150	TGL-S50
C349	.05		TTP-05	CK-503	MGP05	CCD-503	TA150	TGL-S50
C350	27			TCZ-27		CCT0-270	CN0427	10TCC-Q27
C351	33 N220							10TCR-Q33
C352	68		NPO-DI 68	DTZ-68	CX601CG680K	CCT0-680	CN0468	10TCC-Q68
C353	68		NPO-DI 68	DTZ-68	CX601CG680K	CCT0-680	CN0468	10TCC-Q68
C354	12			TCZ-12	CZ601CG120J	CCT0-120	CN0412	10TCC-Q12
C355	68		NPO-DI 68	DTZ-68	CX601CG680K	CCT0-680	CN0468	10TCC-Q68
C356	68		NPO-DI 68	DTZ-68	CX601CG680K	CCT0-680	CN0468	10TCC-Q68
C357	12			TCZ-12	CZ601CG120J	CCT0-120	CN0412	10TCC-Q12
C358	68		NPO-DI 68	DTZ-68	CX601CG680K	CCT0-680	CN0468	10TCC-Q68
C359	68		NPO-DI 68	DTZ-68	CX601CG680K	CCT0-680	CN0468	10TCC-Q68
C360	12			TCZ-12	CZ6D1CG120J	CCT0-120	CN0412	10TCC-Q12
C401	47 N220 5%							10TCR-Q47
C402	.1 10%		DBE2P1		DPMS2P1	1DP-2-104	PVC101	225P10491WD3
C403	330 5%		GPD X5F331K	DD-331	GP330	CCD-331	GP333	10TS-T33

* Not normally in distributor's stock. Available thru distributor on order to manufacturer. # Sony Part Number

CONTROLS (All wattages 1/2 watt, or less, unless listed)

ITEM No.	FUNCTION	RESISTANCE	REPLACEMENT DATA				
			MFGR. PART No.	CENTRALAB PART No.	CLAROSTAT PART No.	CTS—IRC PART No.	MALLORY PART No.
VR201	Adjacent Sound Reject	100	1-221-984	T-100 (1)		X201R101B (1)	MTC12L1 (1)
VR202	RF AGC	500	1-221-370	T-500 (1)		X201R501B (1)	MTC52L1 (1)
VF203	AGC	500	1-221-370	T-500 (1)		X201R501B (1)	MTC52L1 (1)
VR204	Sound Reject	300	1-221-983	T-30D (1)		X201R251B (1)	MTC32L1 (1)
VR301	AGC	5000	1-221-371	T-5000 (1)		X201R502B (1)	MTC53L1 (1)
VR302	Color Killer	5D00	1-221-371	T-5DD0 (1)		X201R502B (1)	MTC53L1 (1)
VR401	Red Drive	330	1-221-986				
VR402	Green Drive	330	1-221-986				
VR403	Blue Drive	330	1-221-986				
VR404	Red Background	250K	1-221-985	T-250K		X201R254R	MTC254L1
VR405	Green Background	250K	1-221-985	T-250K		X201R254B	MTC254L1
VR406	Blue Background	250K	1-221-985	T-25DK		X201R254B	MTC254L1
VR501	Height	50D0	1-221-371	T-5000 (1)		X201R502B (1)	MTC53L1 (1)
VR502	Vert. Linearity	10K	1-221-359	T-10K (1)		X201R203B (1)	MTC14L1 (1)
VR503	Vert. Bias	10K	1-221-359	T-10K (1)		X201R103B (1)	MTC14L1 (1)
VR504	Horiz. Frequency	3000	1-221-610	T-2500 (1)		X201R252B (1)	MTC33L1 (1)
VR601	Top-Bottom Pincushion	10K	1-221-383	T-10K		X201R1D3B	MTC14L1
VR602	B+ Adjust	1D00	1-221-981	T-1DD0		X201R102B	MTC13L1
VR701	Dynamic Convergence Tilt Adjust	5D, Tap @ 25,2W	1-225-073				
VR702	GCC (Gun Center Control)	500, 2W	1-225-D97	V-5D0	U39-500	110-600	MR600P or MRS375
VR703	Focus	250K	1-221-982	T-250K		X201R254B	MTC254L1
VR801	HV Adjust	10meg	1-222-230	F1-10meg, SNK010,AK-38	A47-10meg-S, RN-3,TT-2 or (NP-10meg-S, NML-A-300,TT-2]	B11-143,TM4 or [BU11,CF70, SS6] *	UA17L (2), SN1000
VR901	Volume	5000	1-222-131 (131-11D)				
VR902	Color	50D	1-222-132 (132-11U)				
VR903	Brightness	5000	1-222-135 (135-11B)				
VR904	Hue (Tint)	5000	1-222-13D (130-11U)				
VR905	Contrast	500	1-222-177 (177-11B)				
VR906	Vert. Hold	2000	1-222-129 (129-11B)				
VR907	Horiz. Hold	20K	1-222-134 (134-11B)				

(1) For horizontal mounting, modify terminals to fit "PC" board.
(2) Enlarge mounting hole.

* "SNAPTROL"